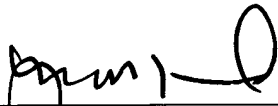


TRANSMITTAL OF APPEAL BRIEF			Docket No. 0114089.00121US1
In re Application of: Douglas B. WILSON			
Application No. 10/727,306-Conf. #5202	Filing Date December 3, 2003	Examiner V. Luong	Group Art Unit 3682
Invention: FATIGUE RELIEVING SUPPORT FOR STEERING WHEELS AND THE LIKE			
<u>TO THE COMMISSIONER OF PATENTS:</u>			
Transmitted herewith is the Appeal Brief in this application, with respect to the Notice of Appeal filed: <u>August 25, 2006</u> .			
The fee for filing this Appeal Brief is <u>\$ 250.00</u> .			
<input type="checkbox"/> Large Entity <input checked="" type="checkbox"/> Small Entity			
<input type="checkbox"/> A petition for extension of time is also enclosed.			
The fee for the extension of time is _____ .			
<input type="checkbox"/> A check in the amount of _____ is enclosed.			
<input checked="" type="checkbox"/> Charge the amount of the fee to Deposit Account No. <u>08-0219</u> . This sheet is submitted in duplicate.			
<input type="checkbox"/> Payment by credit card. Form PTO-2038 is attached.			
<input checked="" type="checkbox"/> The Director is hereby authorized to charge any additional fees that may be required or credit any overpayment to Deposit Account No. <u>08-0219</u> . This sheet is submitted in duplicate.			
 Wayne M. Kennard Attorney Reg. No. : 30,271 WILMER CUTLER PICKERING HALE AND DORR LLP 60 State Street Boston, Massachusetts 02109 (617) 526-6000		Dated: <u>August 25, 2006</u>	
Express Mail Label No. EV 224760580 US Dated: August 25, 2006			



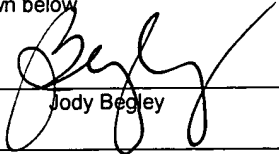
In the United States Patent and Trademark Office

Applicant(s) Douglas B. Wilson
Serial No. 10/727,306
Filed 12/03/2003
Title FATIGUE RELIEVING SUPPORT FOR STEERING
WHEELS AND THE LIKE
Examiner Vinh Luong
Unit 3682

CERTIFICATE UNDER 37 C.F.R. § 1.10

I hereby certify that the attached papers are being deposited with the United States Postal Service as "Express Mail Post Office to Addressee" Mailing Label No. EV 224760580 US addressed to: Mail Stop Appeal Brief – Patents, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 on the date shown below

on August 25, 2006.



Jody Begley

APPEAL BRIEF UNDER 37 C.F.R. §1.192

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SIR:

This is an Appeal Brief pursuant to the Notice of Appeal filed August 25, 2006 appealing the rejection of claims 14-19, 24/14, and 27 in the Office Action dated March 30, 2006.

I. REAL PARTY IN INTEREST

The real party in interest is Douglas B. Wilson, 20 Nichols Road, Cohasset, MA 02025, Applicant/Appellant.

II. RELATED APPEALS AND INTERFERENCES

Appellant has filed an Appeal with regard to U.S. Patent Application Ser. No. 10/720,821 filed November 24, 2003, on even date. U.S. Patent Application Ser. No. 10/720,821 is the parent of the present application. A number of issues to be decided in that the Appeal with regard to U.S. Patent Application Ser. No. 10/720,821 are the same or similar to the issues to be decided in the present Appeal. Therefore, the decisions in the Appeal related to U.S. Patent Application Ser. No. 10/720,821 would directly affect or have a bearing on the Board's decision in this Appeal.

III. STATUS OF THE CLAIMS

Claims 14-19, 24/14, and 27 are pending in the present application and presented here on appeal. Claims 1-13 were the original filed claims. In the Response dated October 27, 2005, Appellant cancelled claims 1-13 and added claims 14-28. In the Office Action dated December 30, 2005, the Examiner issued a restriction requirement. In the Amendment and Response to Restriction Requirement dated January 30, 2006, Appellant selected the species of Figures 1, 3, and 4 that were readable on claims 14-19, 24/14, and 27 to prosecute in the present application. Further, claims 20-23, 24/20, 25, 26, and 28 that were not selected were considered by the Examiner to be withdrawn from prosecution in the present application.

Claims 14-19, 24/14, and 27 have been twice rejected under 35 U.S.C. §112, second ¶, for indefiniteness and under 35 U.S.C. §102 for anticipation in light of U.S. Patent No. 1,575,848 to Laubach et al. ("Laubach"), U.S. Patent No. 2,118,540 to Van Arsdel ("Van Arsdel"), and U.S. Patent No. 2,134,020 to Anson ("Anson"). More specifically with regard to the latter rejection, the Examiner relied on Van Arsdel or Anson in rejecting claims 14-17, 19/17, 24/14, and 27 for anticipation; and Laubach in rejecting claims 14, 18, and 19/18 for anticipation. The indefiniteness and anticipation rejections to claims 14-19, 24/14, and 27 are appealed.

The Examiner also has provisionally rejected claims 14-19, 24/14, and 27 under the judicially created doctrine of obviousness-type double patenting over claims 20-28 of co-pending, parent application U.S. Patent Application Ser. No. 10/720,821, filed November 24, 2003. This provisional rejection is not being appealed at this time. However, if the Board reverses the Examiner in this Appeal and the Appeal with regard to U.S. Patent Application Ser.

No. 10/720,821, Appellant will file a terminal disclaimer to overcome any obviousness-type double patenting rejection.

IV. STATUS OF AMENDMENTS

Claims 1-13 were the original filed claims. Claims 1-13 were cancelled and claims 14-28 were added in the Response dated October 27, 2005. Claims 14-28 were to overcome the Examiner's basis for rejecting claims 1-13 for anticipation under 35 U.S.C. §102(b) based separately on U.S. Patent No. 4,708,676 to Lin "(Lin)", U.S. Patent No. 4,875,386 to Dickinson ("Dickinson"), and U.S. Patent No. 3,937,629 to Hamasaka ("Hamasaka"). The Examiner responded to the October 27th Response by issuing a restriction requirement in the Office Action dated December 30, 2005. In Applicant's Amendment and Response to Restriction Requirement dated January 30, 2006, Applicant selected the species of Figures 1, 3, and 4 that were readable on claims 14-19, 24/14, and 27 to prosecute in the present application. In this Amendment, Appellant also amended Claims 14, 17, 18, and 20 to more distinctly claim the invention. Further, claims 20-23, 24/20, 25, 26, and 28 that were not selected were considered by the Examiner to be withdrawn from prosecution in the present application as evidenced in the Office Action dated March 30, 2006.

In an Amendment dated June 12, 2006, Appellant amended claims 15 and 17 to overcome indefiniteness rejections under 35 U.S.C. §112, second ¶, that was raised in the prosecution of U.S. Patent Application Ser. No. 10/720,821, the parent application to the present application, to similar claim language. This was done before it was raised in the present application. This amendment to the claims 15 and 17 was repeated in the Response filed June 26, 2006, because the Examiner had not previously entered these amendments to the claims. The Examiner did enter these amendments to Claims 15 and 17 after the filing of the June 26th Response as evidenced in the Office Action dated July 14, 2006. There were no further amendments to the claims.

Claims 1-13 were rejected in the Office Action date April 26, 2005. These claims, as stated, were cancelled in the Response dated October 27, 2005. Claims 14-19, 24/14, and 27 were finally rejected in the Office Action dated March 30, 2006. The rejection in the March 30, 2006, Office Action was made final because the Examiner contended that "Applicant's

amendment necessitated the new ground(s) of rejection presented in the Office Action.”

Applicant filed the Notice of Appeal on even date herewith.

Claims 14-19, 24/14, and 27, as amended in the Response dated June 26, 2006, are hereby presented in the Appeal.

V. SUMMARY OF CLAIMED SUBJECT MATTER

The present invention is directed to a novel system and method that is associated with a steering wheel for relieving or preventing fatigue when driving a vehicle for extended periods of time. The system will at least provide support for a portion of the driver’s body, such as wrists, to relieve or prevent fatigue. (Specification: Page 2, lines 5-10) The present invention also provides that the second section may be rigid, semi-rigid, non-deformable, or flexible. Of the pending claims, claim 14 is an independant claim and claims 15-19, 24/14, and 27 depend directly or indirectly from claim 14.

Claim 14 recites a fatigue relieving/preventing apparatus that has two sections.¹ According to claim 14, the first section connects to the periphery of the steering wheel. (Specification: Page 3, lines 19-26) The second section connects to, and extends outward from, the first section at an angle to a plane across the face of the steering wheel and the second section, as stated, may be rigid, semi-rigid, flexible, or non-deformable. The second section will support, for example, the driver’s wrists, as long as the pressure on the second section is less than the pressure necessary to deform it. However, when greater than the deforming pressure is applied to the second section, such as in an emergency, this section will deform out of the interference with the driver’s ability to grab the steering wheel. (Figures 1, 2, 3, 4; Specification: Page 3, lines 19-32; Page 4, lines 10-23; Page 5, line 15 to Page 6, line 3)

Claims 15-19, 24/14, and 27 add further limitations to claim 14. Claim 15 adds that the steering wheel may control nautical vessels, aircraft, or ground transportation vehicles. (Specification: Page 2, lines 18-21; Page 8, original claim 2) Claim 16 adds that the second section can support the forearm, wrist, or hand. (Specification: Page 5, lines 11-14; Page 8, original claim 3) Claim 17 adds that the first section extends a predetermined length of the periphery of the steering wheel. (Figures 1 and 2; Specification: Page 3, lines 18-31; Page 4, line 29 to Page 5, line 7; Page 8, original claim 4) Claim 18 adds that the second section includes at

¹ Appendix A contains a full version of amended claim 14.

least two sections that connect to the first section. (Figure 2; Specification: Page 4, lines 10-13) Claim 19 adds that the first section is deformable. (Specification: Page 3, lines 18-25) Claim 24/14 adds that the first section is formed integral with the steering wheel. (Figures 1 and 2; Specification: Page 5, lines 1-3) Claim 27 adds that the first section may be rigid, semi-rigid, or non-deformable. (Specification: Page 3, lines 18-25) Appellant notes for the purpose of this Appeal that Claim 27 recites that the first section may be flexible, rigid, semi-rigid, or non-deformable. However, the specification supports that the first section may be rigid, semi-rigid and non-deformable. (Specification: Page 2, lines 19-32) Therefore, Appellant will agree to amend claim 27/14 in accordance with the specification.

A significant aspect of the present invention is that the second section will deform out of interference with the operation of the steering wheel if it is grabbed in an emergency. This is shown graphically in Figure 4. The result is a novel apparatus that relieves or prevents fatigue when driving for extended periods of time but does not prevent the driver from grabbing the wheel in emergencies.

VI. GROUNDS OF REJECTION TO BE REVIEWED ON APPEAL

Claims 14-19, 24/14, and 27 were rejected in the Office Action dated March 30, 2006. In that Office Action, the Examiner rejected claims 14-19, 24/14, and 27 on the following bases:

- A. Claims 14-19, 24/14, and 27 under 35 U.S.C. § 112, second ¶, for indefiniteness;
- B. Claims 14-17, 19/17, 24/14, and 27 under 35 U.S.C. § 102(b) for allegedly being anticipated by Van Arsdell;
- C. Claims 14-17, 19/17, 24/14, and 27 under 35 U.S.C. § 102(b) for allegedly being anticipated by Anson; and
- D. Claims 14, 18, and 19/18 under 35 U.S.C. § 102(b) for allegedly being anticipated by Laubach.

Appellant requests that the Board review on Appeal and overturn the Examiner's bases for rejection set forth in the Office Action dated March 30, 2006.

As stated, a copy of amended claims 14-19, 24/14, and 27 is set forth in Appendix A. For the Board's convenience, a copy of Appellant's June 12, 2006, Response, which includes Appellant's last claim amendments, is attached as Appendix B; Appellant's June 26, 2006, Response is attached as Appendix C; the Office Action dated July 14, 2006 is attached as

Appendix D; and the Appellant's August 3, 2006, Amendment and Response to Notice of Non-Compliant Amendment is attached as Appendix E.

VII. ISSUE

Appellant, contrary to the contentions of the Examiner, submits that amended claims 14-19, 24/14, and 27 are (1) not indefinite under 35 U.S.C. §112, second ¶, (2) not anticipated by Van Arsdel under 35 U.S.C. §102(b), (3) not anticipated by Anson under 35 U.S.C. §102(b), and (4) not anticipated by Laubach under 35 U.S.C. §102(b).

VIII. GROUPING OF CLAIMS

Claims 14-19, 24/14, and 27 are presented on appeal and the respective claims do not stand or fall together. Each of the claims recites a distinct set of claim elements that are separately patentable from the other claims.

IX. ARGUMENT

A. General

The Examiner has rejected claims 14-19, 24/14, and 27 under 35 U.S.C. §112, second ¶, for indefiniteness. The basis of the rejection is that the Examiner contends the terms "rigid," "semi-rigid," "flexible," and "non-deformable" in claims 14 and 17 are indefinite. Appellant submits that they are definite and the rejection should be reversed.

The Examiner also has rejected claims 14-17, 19/17, 24/14, and 27 under 35 U.S.C. §102(b) for anticipation based on Van Arsdel or Anson, and claims 14, 18, and 19/18 under 35 U.S.C. §102(b) for anticipation based on Laubach. The standard for sustaining a rejection for anticipation is that a single prior art reference must disclose each and every limitation of the claim. *See, e.g., Schering Corp. v. Geneva Pharma., Inc.*, 339 F.3d 1373, 1377 (Fed. Cir. 2003) ("[a] patent [claim] is invalid for anticipation if a single prior art reference discloses each and every limitation of the claimed invention"); *Trintec Industries, Inc. v. Top-USA Corp.*, 295 F.3d 1292, 1295 (Fed. Cir. 2002) ("[a] single prior art reference anticipates a patent claim if it expressly or inherently describes each and every limitation set forth in the patent claim.... Inherent anticipation requires that the missing descriptive material is 'necessarily present,' not merely probably or possibly present, in the prior art"); *Brown v. 3M*, 265 F.3d 1349, 1351 (Fed. Cir. 2001) ("[t]o anticipate, every limitation of the claimed invention must be found in a single

prior art reference, arranged as in a claim”); *Kloster Speedsteel AB v. Crucible, Inc.*, 794 F.2d 1565, 1571 (Fed. Cir. 1986) (“absent from the reference of any claimed element negates anticipation”). Neither Van Arsdel, Anson, nor Laubach meet this standard and the rejections should be reversed.

In the Office Action dated July 14, 2006, the Examiner stated the following with regard to the support for the anticipation rejections based on Van Arsdel, Anson, and Laubach:²

Moreover, Applicant’s arguments are similar to the arguments presented in co-pending Application No. 10[/720821[.] [T]he Examiner’s response to the final rejection on May 9, 2006 of Appl. ’821 is incorporated herein by reference.

The final rejection in co-pending U.S. Patent Application Ser. No. 10/720,821, the parent of the present application, was directed to the anticipation rejections based on Van Arsdel, Anson, and Laubach. The Examiner advanced the same arguments as are advanced in the present application as grounds for rejecting claims 14-19, 24/14, and 27 for anticipation based on these three references. Therefore, Appellant is advancing the same or substantially similar positions in this Appeal with regard to overcoming the Examiner’s anticipation rejections that have been raised against claims 14-19, 24/14, and 27. A copy of the Office Action dated May 9, 2006, from co-pending Application No. 10/720,821 is attached as Appendix F.

B. The Claims are Definite

The Examiner contends that claims 14 and 27 are indefinite under 35 U.S.C. §112, second ¶, because of the recitation of the terms “rigid,” “semi-rigid,” “flexible,” and “non-deformable.”³ Applicant submits that these terms would be understood by a person of ordinary skill in the art in light of the present invention.

In particular, the Examiner asserts that these terms are indefinite because these terms “[are] not defined by the claim, the specification does not provide a standard for the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention.” Further, the Examiner contends “it is unclear what range of Rockwell hardness of the material of the second section is required in order to be considered as terms “rigid, semi-rigid, or flexible, or non-deformable.” Appellant submits that the claims are definite as will be shown.

² A copy of the Office Action dated July 14, 2006 is attached as Appendix D.

³ See Section V above with respect to the indefiniteness rejection directed to claim 27.

Claims 14 and 27 include the terms “rigid,” “semi-rigid,” “flexible,” and “non-deformable.” Appellant attached as Attachment A to the Response dated June 26, 2006, excerpts from the Ninth New Collegiate Dictionary. These excerpts demonstrate that each of the terms that the Examiner has contended is indefinite is a very common term that a person of ordinary skill in the art would understand with sufficiency to make and use in the present invention. Moreover, Appellant has not given any special meaning to these terms other than their ordinary meaning.

The attached excerpts make plain that a person of ordinary skill in the art would clearly understand the scope of the claims when either “rigid,” “semi-rigid,” or “flexible,” or “non-deformable,” is used. As such, claims 14 and 27 would be definite in the hands of a person of ordinary skill in the art. Noting this, Appellant overcomes the Examiner’s indefiniteness rejection under 35 U.S.C. §112, second ¶, as to the use of the terms “rigid,” “semi-rigid,” “flexible,” and “non-deformable,” and respectfully requests that the Board reverse this rejection.

C. Van Arsdel Does Not Anticipate Claims 14-19, 24/14, and 27

The Examiner rejected claims 14-17, 19/17, 24/14, and 27 as being anticipated by Van Arsdel. In order to demonstrate that Van Arsdel includes each of the elements of claim 20, the Examiner principally relies on the Van Arsdel’s Figures and Examiner-annotated versions of Figures 3 and 5 of Van Arsdel.⁴ In his rejection, the Examiner states that reference no. 4 (in the Van Arsdel Figures) equates to the first section and reference no. 2 (in the Van Arsdel Figures) equates to the second section of claim 14. Appellant submits that the Examiner fails to consider and appreciate all of the elements of the second section because if he does, two things are clear: (i) the grip-rest is in a plane parallel with the one across the face of the steering wheel and (ii) there is a missing element. Therefore, Van Arsdel does not establish a prima facie basis of anticipation, even considering the “broadest reasonable interpretation” standard recited by the Examiner in the Office Action.

At least one missing element from the Van Arsdel teachings is underlined in the following quotation:

The second section extends from the first section outward at an angle to a plane across the face of the steering wheel, the second section for supporting at least a portion of a vehicular operator’s body when pressure from the portion of

⁴ The annotated versions of Figures 3 and 5 are Attachment 1 to the Office Action dated May 9, 2006. (Appendix F)

the vehicular operator's body on the second section is less than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel, and deforming out of interference with the vehicular operator's ability to operate the steering wheel when pressure from the portion of the vehicular operator's body on the second section is equal to or greater than the pressure for performing the second section out of interference with the vehicular operator's ability to operate the steering wheel. [Emphasis added.]

The Examiner's citation to Van Arsdel to support his contention that it teaches each of the elements of the second section is the following:⁵

The rotation of the steering wheel by hand pressure against the flanges 4 and 5 is assisted by the palm and fingers which are wrapped around the rim of the wheel, and to increase the finger hold the grip-rest 2, which is thickened and bifurcated to straddle the rim as shown in Fig. 6, is provided with recesses separated by ridges here shown as three in number, 6, 7, and 8....

The weight of the hand and arm are comfortably supported with the bottom of the hand resting in the concavity of the grip-rest as shown in Fig. 1, or with the ball of the thumb seated in the concavity as shown in Fig. 2....

My improved grip-rest may be formed integral with the rim of the steering wheel as shown in Fig. 8, but I prefer to make it removable as an attachment for any make of car and also to make it adjustable to suit the requirements or fancy of the driver.

Van Arsdel, Page 1, Right Column, Lines 29-54.

The Examiner contends that the grip-rest is deformable; however Appellant submits this is not supported by Van Arsdel. Van Arsdel requires the following to move the grip-rest: loosen the screw, reposition the grip-rest, and retighten the screw. (Van Arsdel, Page 2, Left Column, Lines 28-32) Appellant submits that this is not deforming according to claim 14 during normal use of the grip-rest. Once the grip-rest of Van Arsdel is in place, it is fixed, and does not move. Thus, Van Arsdel is missing the deforming element.

Appellant's position on the teachings of Van Arsdel is supported by the reference:

The grip-rest 2 is concave longitudinally and about half of the rest extends over and part way across a steering wheel rim 3 in a manner to slope downwardly and inwardly of the rim. The outer edge 4 on the side, and 5 on the rear end of the concave, located above the rim, extends up into a marginal flange to be contacted by the inside of the ball of the thumb by the bottom of the hand, depending upon which part of the hand is seated on the rest. These flanges 4 and 5 enable the operator instantly to feel any deviation of the car from a straight course and gives him something substantial to push

⁵ See Office Action dated May 9, 2006, p. 3. (Appendix F)

against in resistance and also in rotating the wheel to steer the car around corners and curves and away from obstructions or bad places in the roadway. Emphasis added.]

Van Arsdel, Page 1, Right Column, Lines 13-28.

The quotation immediately above clearly demonstrates that the grip-rest of Van Arsdel does not deform according to claim 14 when pressure is applied to it. Noting this, Van Arsdel is missing at least one element and, as such, it cannot establish a prima facie basis of anticipation.

Claims 15-17, 19/17, 24/14, and 27 depend from claim 14. As such, each of these claims has all of the features of claim 14. Therefore, claims 15-17, 19/17, 24/14, and 27 are not anticipated by Van Arsdel for at least the same reasons as Claim 14.

In Section V above, Appellant states what claims 15-17, 19/17, 24/14, and 27 add to what is claimed in claim 14. These separate combinations, namely 15/14, 16/14, 17/14, 19/17, 24, and 27/14, each provides bases for not being anticipated, which includes the reasons claim 14 is not anticipated.

Noting the foregoing, Appellant has demonstrated clearly that claims 14-17, 19/17, 24/14, and 27 are not anticipated by Van Arsdel and respectfully request that this basis for rejection be reversed.

D. Anson Does Not Anticipate Claims 14-17, 19/17, 24/14, and 27

The Examiner rejected claims 14-17, 19/17, 24/14, and 27 as being anticipated by Anson. Relying on Examiner-annotated versions Figures 1, 2, and 8 of Anson, the Examiner states that reference no. 13 equates to the first section and reference no. 11 equates to the second section of claim 14.⁶ However, it is important to review the description of the Anson attachment on which the Examiner puts tremendous weight in considering the issue of anticipation:

I have found that in the driving of an automobile and particular when driving for extended periods of time over long distances, the normal manner of holding and manipulating the steering wheel, wherein both driver's hands grasp the wheel and positions which require the driver's arms remain in a raised and more or less unnatural and uncomfortable position, considerable strain develops in the driver's hands, arms, shoulders and back particularly, and results in excess of fatigue...

To obviate these disadvantages, I have devised an attachment for steering wheels, which permits a driver to assume a completely comfortable and relaxed driving position, while at the same time, affords a means permitting the driver to at all times retain positive operating control of the steering wheel. [Emphasis added]

⁶ See Office Action dated May 9, 2006, p. 4. (Appendix F)

Anson, Page 1, Left Column, Lines 6-25.

The steering wheel attachment of Anson is described as follows:

The attachment comprises a hand grip portion 11, which is preferably of bulbular form.... Grip portion 11 normally extends downward from the wheel rim and is of suitable length to adapt same to extend to the region of the driver's lap so that it may be grasped by the driver's hand when his hand is resting in a normal comparable position in his lap. Grip portion 11 is reduced in cross-sectional area at one end to form a neck 12. Neck 12...will have sufficient pliability...to be deflected from its normal pendant position without adversely affecting the measure of control of the steering wheel movements afforded by the positive operating movement of the attachment, while at the same time, neck 12 will retain sufficient rigidity to permit operating movements of hand grip 11 to be positively communicated to the steering wheel rim for effective control of its movements. [Emphasis added]

Anson, Page 1, Right Column, Line 49 – Page 2, Left Column, Line 18.

The Examiner has cited Anson at Page 2, Left Column, Lines 62-72, as teaching the deformability element of the second section in claim 14. As the quotation above demonstrates, when the Anson handgrip is in use, it is in the pendant position below the steering wheel and used to steer the vehicle. If, during normal operations, the driver were to grab the steering wheel in an emergency situation, he would release the handgrip and grab the wheel, for example, at the 10 and 2 o'clock positions. In doing so, the pendant-hanging handgrip would not be deformed as set forth in claim 14 because it would not be in use at all. Moreover, if it were used, it would not be deformed out of interference but would be held in the pendant position to steer the vehicle and not released. Further, if the handgrip is moved to the top of the steering wheel, it will be awkward and dangerous to use because the driver's hands will be disposed through the steering wheel. In this position, it also will not provide any of the benefits recited in Anson to relieve fatigue in the arms or hands of the driver.

The Examiner has stated the handgrip of Anson equates to deformation according to claim 14 because it may be moved from the bottom pendant position to the top of the steering wheel. When the handgrip is moved to the top, it is moved there to be placed purposefully out of use all the time. As such, it will not be in a position to be deformed as set forth in the second section of claim 14.⁷ If the handgrip is moved to the top of the steering wheel, as suggested by the Examiner, it would be awkward and dangerous to use for driving because the driver's hands

⁷ Anson, Page 2, Left Column, Lines 68-72.

would be disposed through the steering wheel. In order to move the handgrip, it would be understood that the vehicle would have to be stopped, the handgrip detached and repositioned at the top, and reattached. Noting this, Anson is missing at least the deforming element of claim 20 and, as such, it does not support a prima facie basis of anticipation.

Claims 15-17, 19/17, 24/14, and 27 depend from claim 14. Thus, each of these claims has all of the features of claim 14. Therefore, claims 14-17, 19/17, 24/14, and 27 are not anticipated by Anson for at least the same reasons as claim 14.

In Section V above, Appellant sets forth what claims 14-17, 19/17, 24/14, and 27 add to claim 14. These separate combinations, namely 15/14, 16/14, 17/14, 19/17, 24, and 27/14, each provides bases for not being anticipated, which includes the reasons claim 14 is not anticipated by Anson.

Noting the foregoing, Appellant has demonstrated clearly that claims 14-17, 19/17, 24/14, and 27 are not anticipated by Anson and respectfully request that this basis for rejection be reversed.

E. Laubach Does Not Anticipate Claims 14, 18, and 19/18

The Examiner rejected 14, 18, and 19/18 for anticipation based on Laubach. The Examiner relies on the Examiner-annotated version Figure 2 of Laubach and indicates that reference nos. 7 and 8 equates to the first section and reference no. 10 equates to the second section of claim 14.⁸ Appellant submits that Laubach does not form a prima facie basis of anticipation because at least one element is missing.

Laubach states the following with regard to the knobs attached to the steering wheel:

By particularly considering the Figures 2 and 3, it will be seen that the knobs 2 are secured to the rim of the wheel 1 by means of securing screws 4, these screws being threaded as indicated at 5 longitudinally through the knob 2, and extending for quite a distance through the entire length of the knobs, thereby efficiently bracing the same. The inner ends of the knobs 2 are concave as indicated at 6, so as to conform to the contour of the outer periphery of the wheel 1...

Each knob 2 is provided with a plurality of finger sockets 9 upon the upper face thereof, and an enlarged head portion 10 at the outer end thereof, for the purpose of facilitating the gripping of the knob and preventing the actual slippage of the hand of the operator from the knob 2. [Emphasis added]

Laubach, Page 1, Lines 43–71.

⁸ See Office Action dated May 9, 2006, pp. 5-6. (Appendix F)

The description of the knobs and a review of the Figures makes plain that the knobs are not deformable and they are not disposed at an angle with respect to the plane across the face of the steering wheel. The knobs are rigidly connected to the steering wheel by screws 5. Any movement of them requires removing the screws, drilling the wheel at a new location, and reattaching the knobs at the new location. At this new location, the knobs will be in a plane parallel to the plane across the face of the steering wheel.

The knobs do not deform out of interference with the operation of the steering wheel, as does the second section of claim 14. In fact, once the Laubach knobs are secured by screws 5 as shown and described, they are fixed and not movable during normal operations. If they are not unscrewed, the only movement would be to apply a destructive force to the knobs, thereby breaking them. Therefore, Laubach does not support a prima facie basis of anticipation because it is missing at least one element of claim 14 relating to deformation of the knobs out of interference with the operation of the steering wheel in the normal operation of the knobs.

As Appellant previously stated, claims 18 and 19/18 depend from claim 14. As such each of these claims have all of the features of claim 14. Therefore, claims 18 and 19/18 are not anticipated by Laubach for the same reasons as claim 14.

Section V above states what claims 18 and 19/18 add to the invention of claim 14. These separate combinations, namely 14/18 and 14/19, each provides bases for not being anticipated, which includes the reasons claim 14 is not anticipated by Laubach.

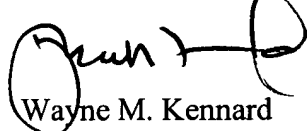
Noting the foregoing, Appellant has demonstrated clearly that claims 14, 18, and 19/18 are not anticipated by Laubach and respectfully request that this basis or rejection be reversed.

X. CONCLUSION

In the foregoing, Appellant has clearly traversed each of the Examiner's bases for rejecting amended claims 14-19, 24/14, and 27 under 35 U.S.C. §112, second ¶, for indefiniteness, and claims 14-19, 24/14, and 27 under 35 U.S.C. §102 for allegedly being anticipated by Van Arsdell, Anson, and Laubach. Accordingly Appellant requests that the Board reverse these outstanding rejections and remand the application to Examiner and direct that the application be sent to issue.

No fees are believed due; however, please charge any additional fees due or overpayments to Deposit Account No. 08-0219.

Respectfully submitted,

A handwritten signature in black ink, appearing to read "Wayne M. Kennard", written over a circular stamp or seal.

Wayne M. Kennard
Registration No. 30,271
Attorney for Appellant

Dated: August 25, 2006

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- Appendix A: A copy of amended claims 14-19, 24/14 and 27
- Appendix B: A copy of Appellant's Response dated June 12, 2006
- Appendix C: A copy of the Response dated June 26, 2006
- Appendix D: A copy of the Office Action dated July 14, 2006
- Appendix E: A copy of Appellant's Amendment and Response to
Notice of Non-Compliant Amendment dated August 3, 2006
- Appendix F: A copy of the Office Action dated May 9, 2006 of
co-pending Application Serial No. 10/720,831

APPENDIX A

In the Claims

1-13. (Cancelled)

14. (Previously Presented) A fatigue relieving/preventing apparatus associated with a steering wheel for controlling a vehicle, comprising:

a first section that connects to a peripheral portion of the steering wheel; and
a rigid, semi-rigid or flexible, or non-deformable second section that connects to, and extends from the first section at the peripheral portion of the steering wheel, the second section extends from the first section outward at an angle to a plane across a front face of the steering wheel, the second section for supporting at least a portion of a vehicular operator's body when pressure from the portion of the vehicular operator's body on the second section is less than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel, and deforming out of interference with the vehicular operator's ability to operate the steering wheel when pressure from the portion of the vehicular operator's body on the second section is equal to or greater than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel.

15. (Previously Presented) The apparatus as recited in claim 14, wherein the steering wheel includes the steering wheel for controlling at least a nautical vessel, aircraft, or ground transportation vehicle.

16. (Previously Presented) The apparatus as recited in claim 14, wherein the portion of the body supported by the second section includes at least a forearm, wrist, or hand.

17. (Previously Presented) The apparatus as recited in claim 14, wherein the first section extends a predetermined length of the peripheral portion of the steering wheel.

18. (Previously Presented) The apparatus as recited in claim 14, wherein the second section includes at least two second sections that each connect to the first section at separate locations.

19. (Previously Presented) The apparatus as recited in claim 17 or 18, wherein the first section is deformable.

20. (Withdrawn) A fatigue relieving/preventing apparatus associated with a steering wheel for controlling a vehicle, comprising:

at least two discrete first sections that each connect to a peripheral portion of the steering wheel, and

a discrete rigid, semi-rigid or flexible, or non-deformable second section that connects to, and extends from each first section at a peripheral portion of the steering wheel, each second section extends from the first section outward at an angle to a plane across a front face of the steering wheel, each second section for supporting at least a portion of a vehicular operator's body when pressure from the portion of the vehicular operator's body on the second section is less than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel, and deforming out of interference with the vehicular operator's ability to operator the steering wheel when pressure form the portion of the vehicular operator's body on the second section is equal to or greater than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel..

21. (Withdrawn) The apparatus as recited in claim 20, wherein the steering wheel includes a steering wheel for controlling at least a nautical vessel, aircraft or ground transportation vehicle.

22. (Withdrawn) The apparatus as recited in claim 20, wherein the portion of the body supported by the second section includes at least a forearm, wrist, or hand.

23. (Withdrawn) The apparatus as recited in claim 20, wherein the apparatus is adjustable for supporting different sizes or types of body portions.

24. (Previously Presented) The apparatus as recited in claim 14, wherein each first section is formed integral with the steering wheel.

25. (Withdrawn) The apparatus as recited in claim 14 or 20, wherein each first section is detachable from the steering wheel.

26. (Withdrawn) The apparatus as recited in claim 20, wherein each first section is deformable.

27. (Previously Presented) The apparatus as recited in claim 14, wherein the first section is flexible, rigid, or semi-rigid, or non-deformable.

28. (Withdrawn) The apparatus as recited in claim 20, wherein the first section is flexible, rigid, or semi-rigid, or non-deformable.

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of: Wilson

Examiner: Vinh Luong

Serial No.: 10/727,306

Art Unit: 3682

Filing Date: December 3, 2003

For: **FATIGUE RELIEVING SUPPORT FOR STEERING WHEELS AND
THE LIKE**

Mail Stop Amendment
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

Response

Sir:

This is a Response to the Office Action dated March 30, 2006. This Response places the application and the claims therein, in condition for allowance. In this Response, the amendments to the specification begin on page 2, the amendment to the claims begin on page 5, and the Remarks begin on page 8.

Specification:

Page 2, please rewrite the third full paragraph as follows:

The system of the present invention will include at least one part that extends outward at an angle from a plane across the face of the steering wheel or vehicular control. This part is at least partially deformable in at least one direction, so that the system will not interfere with the operation of the wheel or control. This deformability, however, will not impede the support function of the system on the invention. Furthermore, the deformable material has memory, so that after a deforming force is removed, it resumes its original predeformation configuration and shape, which is extending outward at an angle from a plane across the face of the steering wheel or vehicular control.

Page 3, please rewrite the seventh full paragraph as follows:

~~Deformable material~~ second section 102 extends outward from steering control 105 over a predetermined section of the steering control, which is shown in Figure 1 to be an arc. As is better shown in Figure 3, a deformable second section such as 102 extends outward at an angle from a plane across the face of a steering control such as 105. Deformable second section 102 may extend outward from the steering control at or below the inside circumference of the control over the predetermined arc. This arc will typically include at least the ten 104 and two 106 o'clock positions, or may include the entire circumference.

Page 4, please rewrite the fourth and fifth full paragraphs as follows:

The first system of the present invention at 202 includes first section 204 that connects to steering control 211 and second section 205 that extends outward from first section 204. Further, a second section such as 205 extends outward at an angle from a plane across the face of a steering control such as 211 (see Figure 3). First section 204 may be rigid, semi-rigid, or deformable, while second section 205 is deformable. If the first section is deformable, it may have memory.

Similarly, the second system of the present invention at 203 includes first section 207 that connects to steering control 211 and second section 209 that extends outward

from first section 207. Further, a second section such as 209 extends outward at an angle from a plane across the face of a steering control such as 211 (see Figure 3). First section 207 may be rigid, semi-rigid, or deformable, while second section 209 is deformable. Again, if the first section is deformable, it may have memory. Further, second sections 205 and 209 may be rigid, semi-rigid or flexible, or non-deformable and still be within the scope of the present invention.

Page 5, please rewrite second full paragraph as follows:

Referring to Figure 3, generally at 300, steering control 305 is shown that includes rim 308, spokes 310, and steering column 312. First section 301 is formed integral with rim 308 and deformable second section 302 extends outward from the first section. As is shown, second section 302 extends outward at angle 316 from plane 318 across the face of steering control 305. The material of second section 302 has sufficient strength that when driving, the driver may rest his/her wrists or portions of the hands 322 on the material and they will be supported. The structure is such that the weight of the arms and hands through the wrists or portions of the hands are supported without the material deforming.

Page 6, please rewrite the second and third full paragraphs as follows:

Referring to Figure 5, generally at 500, a second embodiment of the present invention is shown. System 501 of the present invention shown in Figure 5 includes a first section 502 that detachably connects to steering control rim. Deformable second section 503 connects to, and extends outwardly from, first section 502. As is shown, deformable second section 503 extends outward at angle 516 from plane 518 across the face of steering control rim 508. First section 502 may snap-on or otherwise attach to the steering control such that it may appear integral with the steering control. One of many possible known means for accomplishing this is by first section 502 being mostly rigid, and leaving a space 507 so the attachment can be forced over rim 508 and leave room for the steering control spokes 510. Regardless of the means for attachment, once first section 502 is attached to the steering control, it will provide all of the benefits that have been described for the first section being integrally formed with the rim. Additionally,

the second embodiment, may be a single structure with a single resting material support, a single structure with multiple resting supports, or multiple structures each with its own resting support. As in the other embodiments, the second section may be rigid, semi-rigid or flexible, or non-deformable and still be within the scope of the present invention.

By way of example, Figure 6, generally at 600, shows another alternate method to attach the system of the present invention to steering control rim 608. The system in this figure has first section 602 that will envelop rim 608. First section 602 may be made from a flexible material. First section 602 may have a slit 611, which after this section envelops the rim, may be stitched shut by stitches 613. As in the other embodiments of the present invention, deformable second section 603 connects to, and extends outwardly from, first section 602. Further, a deformable second section such as 603 extends outward at an angle from a plane across the face of a steering control rim such as 608 (see Figures 3 and 5). Again, the second section may be rigid, semi-rigid, or non-deformable and still be within the scope of the present invention.

In the Claims

14. (Previously Amended) A fatigue relieving/preventing apparatus associated with a steering wheel for controlling a vehicle, comprising:

a first section that connects to a peripheral portion of the steering wheel; and
a rigid, semi-rigid or flexible, or non-deformable second section that connects to, and extends from the first section at the peripheral portion of the steering wheel, the second section extends from the first section outward at an angle to a plane across a front face of the steering wheel, the second section for supporting at least a portion of a vehicular operator's body when pressure from the portion of the vehicular operator's body on the second section is less than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel, and deforming out of interference with the vehicular operator's ability to operate the steering wheel when pressure from the portion of the vehicular operator's body on the second section is equal to or greater than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel.

15. (Currently Amended) The apparatus as recited in claim 14, wherein the steering wheel includes a the steering wheel for controlling at least a nautical vessel, aircraft, or ground transportation vehicle.

16. (Previously Added) The apparatus as recited in claim 14, wherein the portion of the body supported by the second section includes at least a forearm, wrist, or hand.

17. (Currently Amended) The apparatus as recited in claim 14, wherein the first section extends a predetermined length of a ~~predetermined~~ the peripheral portion of the steering wheel.

18. (Previously Amended) The apparatus as recited in claim 14, wherein the second section includes at least two second sections that each connect to the first section at separate locations.

19. (Previously Added) The apparatus as recited in claim 17 or 18, wherein the first section is deformable.

20. (Previously Added) A fatigue relieving/preventing apparatus associated with a steering wheel for controlling a vehicle, comprising:

at least two discrete first sections that each connect to a peripheral portion of the steering wheel, and

a discrete rigid, semi-rigid or flexible, or non-deformable second section that connects to, and extends from each first section at a peripheral portion of the steering wheel, each second section extends from the first section outward at an angle to a plane across a front face of the steering wheel, each second section for supporting at least a portion of a vehicular operator's body when pressure from the portion of the vehicular operator's body on the second section is less than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel, and deforming out of interference with the vehicular operator's ability to operator the steering wheel when pressure form the portion of the vehicular operator's body on the second section is equal to or greater than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel..

21. (Previously Added) The apparatus as recited in claim 20, wherein the steering wheel includes a steering wheel for controlling at least a nautical vessel, aircraft or ground transportation vehicle.

22. (Previously Added) The apparatus as recited in claim 20, wherein the portion of the body supported by the second section includes at least a forearm, wrist, or hand.

23. (Previously Added) The apparatus as recited in claim 20, wherein the apparatus is adjustable for supporting different sizes or types of body portions.

24. (Previously Added) The apparatus as recited in claim 14 or 20, wherein each first section is formed integral with the steering wheel.

25. (Previously Added) The apparatus as recited in claim 14 or 20, wherein each first section is detachable from the steering wheel.

26. (Previously Added) The apparatus as recited in claim 20, wherein each first section is deformable.

27. (Previously Added) The apparatus as recited in claim 14, wherein the first section is flexible, rigid, or semi-rigid, or non-deformable.

28. (Previously Added) The apparatus as recited in claim 20, wherein the first section is flexible, rigid, or semi-rigid, or non-deformable.

Remarks

I. Introduction

Applicant is in receipt of the Office Action dated at March 30, 2006. Claims 14-19, 24/14, and 27 are pending in the present application. The Examiner has recited several grounds for objecting to and rejecting the present application. Examiner objected to the drawings for not including representations to the angular disposition of second section of the fatigue/relieving apparatus. In view of this objection to the drawings, the Examiner objected to the specification. The Examiner also has objected to claims 14-19, 24/14, and 27 for indefiniteness under 35 U.S.C. 112, second paragraph. Lastly, the Examiner rejected pending claims 14-19, 24/14 and 27 under 35 U.S.C. 102(b) for anticipation based on either Van Arsdell, U.S. Patent No. 2,118,540; Anson, U.S. Patent No. 2,134,020; or Laubach, U.S. Patent No. 1,575,848. Applicant will demonstrate herein that the objections and rejections have been overcome by this Response, thereby placing the present application in condition for allowance.

II. The Corrected Drawings Overcome the Examiner's Objection

On page 3 of the Office Action, the Examiner objected to the drawings because "each part of the invention, e.g., the angle and the face in claim 14 should be designated by a reference numeral or character." Applicant has corrected the drawings as requested by the Examiner. These changes to the drawings do not add new matter. As such, Applicant has traversed the Examiner's basis for objection to the drawings.

III. The Specification, As Amended, Overcome the Examiner's Objection

On page 4 of the Office Action, the Examiner objected to the specification for "failing to provide proper antecedent basis for the claimed the subject matter, such as, 'an angle,' in claim 14." Applicant has amended the specification to overcome this objection. These amendments do not add new matter. Therefore, this objection should be withdrawn.

IV. The Claims, As Amended Are Definitive.

On page 3 of the Office Action, the Examiner contends that the terms “rigid,” “semi-rigid,” “flexible,” or “non-deformable” in claims 14 and 17 are indefinite. Applicant submits that these terms would be understood by a person of ordinary skill in the art in light of the present invention.

The Examiner contends that 14 and 17 are indefinite under 35 U.S.C. §§ 112, second paragraph, because of the recitation of the terms “rigid,” “semi-rigid,” “flexible,” and “non-deformable.” In particular, the Examiner asserts that these terms are indefinite because these terms “[are] not defined by the claim, the specification does not provide a standard for the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention.” Further, the Examiner contends that “it is unclear what range of Rockwell hardness of the material of the second section is required in order to be considered as terms “rigid,” semi-rigid, or flexible, or non-deformable.” Applicant submits that the claims are definite as will be shown.

Claims 14 and 17, include the terms “rigid,” “semi-rigid,” “flexible,” and “non-deformable.” Applicant has attached as Attachment A excerpts from the Ninth New Collegiate Dictionary. These excerpts demonstrate that each of the terms that the Examiner has contended is indefinite is a very common term that a person of ordinary skill in the art would understand with sufficiency to make and use the present invention. The attached excerpts make plain that a person of ordinary skill in the art would clearly understand the scope of the claims when “rigid,” “semi-rigid,” or “flexible,” or “non-deformable,” is used. As such, claims 14 and 17 would be definite in the hands of a person of ordinary skill in the art. Noting this, Applicant overcomes the Examiner’s indefiniteness rejection under 35 U.S.C. § 112, second paragraph, as to the use of the terms “rigid,” “semi-rigid,” “flexible,” and “non-deformable,” and respectfully requests that this rejection be withdrawn with regard to claims 14 and 19.

The Examiner also rejected claims 15 and 17 for allegedly having no anticipated basis for the terms “a steering wheel” and “a peripheral portion of the steering wheel,” respectively. Applicant has amended the claims to remove any possible confusion on the part of the Examiner with regard to overcoming this obviousness rejection.

Noting the foregoing, Applicant has traversed each of the Examiner's basis for rejecting the claims for indefiniteness under 35 U.S.C. 112, second paragraph.

V. Claims 14-19 Are Not Anticipated Under 35 § U.S.C. 102(b)

Claims 14-19, 24/14 and 27 are pending in the present application. In the current Office Action, claims 14-19, 24-14 and 27 have been rejected by the Examiner for anticipation under 35 U.S.C. § 102 (b) based on a three references. These references are U.S. Patent No. 1,575,848 to Laubach ("Laubach"), U.S. Patent No. 2,118,540 to Van Arsdel ("Van Arsdel"), and U.S. Patent No. 2,134,020 to Anson ("Anson"). More specifically, the Examiner relied on Van Arsdel or Anson for rejecting claims 14-17, 19/17, 24/14 and 27; and Laubach for rejecting claims 14, 18 and 19/18. Hereinafter, Applicant will demonstrate that claims 14-19, 24/14, and 27, as presently amended, place the present application in condition for allowance and the application should be passed to issue.

A. Applicable Law

In order for there to be anticipation under 35 U.S.C. §102, a single prior art reference must show each and every feature of the claimed invention in the same way. . *Brown v. 3M*, 265 F.3d 1349, 1351 (Fed. Cir. 2001) ("To anticipate, every limitation of the claimed invention must be found in a single prior art reference, arranged as in the claim"); *Kloster Speedsteel AB v. Crucible, Inc.*, 793 F.2d 1565, 1571 (Fed. Cir. 1986) ("absence from the reference of any claimed element negates anticipation"). Applicant submits that neither Van Arsdel, Anson, nor Laubach satisfy this standard for finding anticipation under 35 U.S.C. § 102(b).

B. Van Arsdel Does Not Anticipate Claims 14-19, 24/14, and 27

Claim 14 is an independent claim and claims 15-19, 24/14, and 27 depend from claim 14. As such, claims 15-19, 24/14, and 27 add features to claim 20.

In relying on Van Arsdel, the Examiner does not cite to any descriptions of the auto steering wheel handgrip disclosed in this reference but annotates the drawings for this purpose. Specifically, the Examiner annotated Figures 3 and 5 in an attempt to show what is being claimed in claim 14. The Examiner states that reference no. 4 equates to the first section and reference no. 2 equates to the second section of claim 14. Applicant submits that the Examiner fails to consider and appreciate all of the elements of the

second section because if he did, two things would be clear (i) the grip-rest is in a plane parallel with the one across the face of the steering wheel and (ii) there is a missing element.

Van Arsdel at column 2, lines 13-54 states:

The grip-rest 2 is concave longitudinally and about half of the rest extends over and part way across the steering wheel rim 3 in a manner to slope downwardly and inwardly of the rim. The outer edge 4 on the side, and 5 of the rear end of the concave, located above the rim, extends up into a marginal flange to be contacted by the inside of the ball of the thumb or by the bottom of the hand, depending upon which part of the hand is seated on the rest. These flanges 4 and 5 enable the operator instantly to feel any deviation of the car from a straight course and gives him something substantial to push against in resistance and also in rotating the wheel to steer the car around corners and curves and away from obstructions or bad places in the roadway.

The rotation of the steering wheel by hand pressure against the flanges 4 and 5 is assisted by the palm and fingers, which are wrapped around the rim of the wheel, and increase the fingerhold [on] the grip-rest 2, which is thickened and bifurcated to straddle the rim as shown in Fig. 6, is provided with recesses separated by ridges, here shown as three in number, 6, 7, and 8.... [See Figure 4]

The weight of the hand and arm are comfortably supported with the bottom of the hand resting in the concavity of the grip-rest as shown in Fig. 1, or with the ball of the thumb seated in the concavity as shown in Fig. 2....

My improved grip-rest may be formed integral with the rim of the steering wheel as shown in Fig. 8, but I prefer to make it removable as an attachment for any make of car and also to make it adjustable to suit the requirements or fancy of the driver. [Emphasis added]

A review of Figures 3 and 5, as annotated by the Examiner, attempts to show that the grip-rest of Van Arsdel is disposed outward at an angle α to a plane across the face of the steering wheel shows that the Examiner's position is misplaced. As the description above from Van Arsdel indicates, the grip-rest is disposed as shown in Figure 6 parallel to the plane across the face of the steering wheel not at angle to it. This is very clear because in each disposition of the grip-rest in the Figures, it is fixed in this parallel plane to support the thumb or part of the palm. It is also fixed so that it is not deformable so the driver can put extensive pressure on it (and it will not move) for steering the automobile (See underscored sections in the quotation above).

If the grip-rest were supposed to be at an angle commensurate with the present invention as the Examiner contends, its disposition would be shown differently in the drawings. As such, there is not support for the Examiner's contention that the grip-rest is disposed other than in the plane parallel to the plane across the form of the steering wheel. Accordingly, one skilled in the art would not understand the grip-rest in Van Arsdel to be disposed as the Examiner contends.

There is also no support in the description of the grip-rest in Van Arsdel that it will deform in any way out of interference with the operation of the steering wheel. Applicant submits he is justified in taking this position given the description of the connection of the grip-rest as shown in Figure 6 or the integrally formed grip-rest shown in Figure 8. Therefore, the grip-rest of Van Arsdel would not anticipate the invention as set forth in claim 14 because it is missing at least one element, i.e., Van Arsdel at least does not teach or suggest the features of the second section being deformable out of interference with the operation of the steering wheel as set forth in claim 14.

Noting in the foregoing, Applicant has demonstrated that the auto steering wheel grip-rest of Van Arsdel does not anticipate (or render obvious) the invention of claim 14. Accordingly, Applicant respectfully requests that the anticipation rejection based on Van Arsdel be withdrawn.

Claims 15-17, 19/17, 24/14, and 27 depend from claim 14. As such, each of these dependent claims includes all the features of claim 14. Therefore, claims 15-17, 19/17, 24/14, and 27 are not anticipated by Van Arsdel for the same reasons that claim 14 is not anticipated by this patent. Thus, Applicant has traversed the Examiner's basis for rejecting claims 15-17, 19/17, 24/14, and 27 for anticipation and respectfully requests that this rejection be withdrawn.

C. Anson Does Not Anticipate Claims 14-17, 19/17, 24/14, and 27

The Examiner has rejected claims 14-17, 19/17, 24/14, and 27 for anticipation based on Anson. Referring to the Figures of Anson, the Examiner states that reference no. 13 equates to the first section and reference no. 11 equates to the second section of claim 14. The Examiner has annotated Figure 8 to indicate that the steering wheel attachment of Anson is disposed at an angle α with respect to a plane across the face of

the steering wheel. Before addressing the Examiner's basis of rejection, Applicant submits that the description of the steering wheel attachment of Anson is germane to the Examiner's position on anticipation. Applicant also submits that if this description is taken into consideration, the Examiner should withdraw the anticipation rejection based on Anson.

In the description of the purpose of the steering wheel attachment in Anson, the patent states (Page 1, left column, lines 6-25):

I have found that in the driving of an automobile and particular when driving for extended periods of time over long distances, the normal manner of holding and manipulating the steering wheel, wherein both driver's hands grasp the wheel in positions which require the driver's arms to remain in a raised and more or less unnatural and uncomfortable position, considerable strain develops in the driver's hands, arms, shoulders and back particularly, and results in excess of fatigue, such as will frequently dull the driver's normal reflexes and alertness and thereby increase the danger of accidents.

To obviate these disadvantages, I have devised an attachment for steering wheels, which permits a driver to assume a completely comfortable and relaxed driving position, while at the same time, affords a means permitting the driver to at all times retain positive operating control of the steering wheel. [Emphasis added]

The steering wheel attachment of Anson is subsequently described in the patent. The following description is stated (Page 1, right column, line 49 – Page 2, left column, line 18):

The attachment comprises a hand grip portion 11, which is preferably of bulbular form.... Grip portion 11 normally extends downward from the wheel rim and is of suitable length to adapt same to extend to the region of the driver's lap so that it may be grasped by the driver's hand when his hand is resting in a normal comparable position in his lap. Grip portion 11...which will have sufficient pliability...to be deflected from its normal pendant position without adversely affecting the measure of control of the steering wheel movements afforded by the positive operating movement of the attachment, while at the same time, neck 12 will retain sufficient rigidity to permit operating movements of hand grip 11 to be positively communicated to the steering wheel rim for effective control of its movements. [Emphasis added]

Applicant submits that the steering wheel attachment of Anson does disclose all of the elements of claim 14. As set forth in the quotation above, the steering wheel attachment of Anson is a pliable structure that dangles downward from the bottom of the

steering wheel. It is further understood from the quotation above that in use the steering wheel attachment is grasped by the driver's hand while the arms and hands are resting in the driver's lap. There is no teaching in Anson that the steering wheel attachment can be disposed of any location other than at the bottom of the steering wheel where it dangles for use. The other dispositive of the hand grip at the top of rim is for situations where it is removed from use.

The Examiner has cited Anson at Page 2, Left Column, Lines 62-72, as teaching the deformability element of the second section in claim 14. As the quotation above demonstrates, when the Anson handgrip is in use, it is in the pendent position and used to steer the vehicle. If, during normal operations, the driver were to grab the steering wheel in an emergency situation, he would release the handgrip and grab the wheel, for example, at the 10 and 2 o'clock positions. In doing so, the pendent-hanging handgrip would not be deformed as set forth in claim 14 because it would not be in use. Moreover, if it were used, it would not be deformed out of interference but would be held to steer the vehicle.

The Examiner has stated the handgrip of Anson equates to deformation according to claim 14 because it may be moved from the bottom pendent position to the top of the steering wheel. When the handgrip is moved to the top, it is moved there to be purposefully out of use all the time so it will not be in a position to be deformed as set forth in the second section of claim 14.¹ In order to move the handgrip, it would be understood that the vehicle would have to be stopped, the handgrip detached and repositioned at the top, and reattached.

Given the foregoing, the steering wheel attachment of Anson at least does not indicate the element of the second section being disposed outward at an angle from the plane across the face of the steering wheel (Anson extends rearward) and it does not teach that the attachment will be deformable out of interference with the operation of the steering wheel as set forth in claim 14.

Applicant has demonstrated that claim 14 is not anticipated (or rendered obvious) by Anson and requests that the anticipation rejection based on this patent be withdrawn.

¹ Anson, page 2, left column, lines 68-72.

Claims 15-17, 19/17, 24/14, and 27 depend from claim 14. As such, each of these dependent claims includes all the features of claim 14. Therefore, claims 15-17, 19/17, 24/14, and 27 are not anticipated by Anson for the same reasons that claim 14 is not anticipated by this patent. Applicant has traversed the Examiner's basis for rejecting claims 15-17, 19/17, 24/14, and 27 for anticipation and respectfully requests that this rejection be withdrawn.

D. Laubach Does Not Anticipate Claims 14, 18, and 19/18

The Examiner has rejected claims 14, 18, and 19/18 for anticipation based on Laubach. In formulating the rejection based on Laubach, the Examiner has not relied on any part of the disclosure in that patent but has annotated the drawings to allegedly show that Laubach teaches each and every feature of claim 14. The Examiner states that reference nos. 7 and 8 of the knob 2 equates to the first section and reference no. 10 equates to the second section of claim 14. Applicant submits that the Examiner's reliance on Laubach is misplaced.

Laubach states the following with regard to the knobs attached to the steering wheel (Page 1, line 43 – 71):

By particularly considering the Figures 2 and 3, it will be seen that the knobs 2 are secured to the rim of the wheel 1 by means of securing screws 4, these screws being threaded as indicated at 5 longitudinally through the knobs 2, and extending for quite a distance through the entire length of the knobs, thereby efficiently bracing the same. The inner ends of the knobs 2 are concave as indicated at 6, so as to conform to the contour of the outer periphery of the wheel 1....

Each knob 2 is provided with a plurality of finger sockets 9 upon the upper face thereof, and an enlarged head portion 10 at the outer end thereof, for the purpose of facilitating the gripping of the knob and preventing the actual slippage of the hand of the operator from the knob 2. [Emphasis added]

The Examiner has annotated the drawings to attempt to show that enlarged head 10 is disposed outward at an angle from the plane across the face of the steering wheel. This is not supported.

The hands of the driver are supported by gripping the knobs in the defined finger recesses shown in the drawings. The heads 10 are enlarged for this sole purpose of preventing the hands from slipping off of the knobs. The heads 10 clearly are not

disposed at an angle outward of the plane across the face of the steering wheel but are placed at the end of the knobs solely to act as a stop. Further, the heads 10 are not deformable out of interference with the operation of the steering wheel as set forth in claim 14. They are fixed in place along with the rest of the knobs.

The description of the knobs and a review of the Figures makes plain that the knobs are not deformable and they are not disposed at an angle with respect to the a plane across the face of the steering wheel. The knobs are rigidly connected to the steering wheel by screws 5. Any movement of them requires removing the screws, drilling the wheel at a new location, and reattaching the knobs at the new location. At this new location, the knobs will in a plane parallel to the plane across the face of the steering wheel.

The knobs do not deform out of interference with the operation of the steering wheel as in the second section of claim 14. In fact, once the Laubach knobs are secured by screws 5 as shown and described, they are fixed and not movable during normal operations. If they are not unscrewed, the only movement would be to apply a destructive force to the knobs, thereby breaking them.

Therefore, Laubach at least does not teach the features of the second section being disposed outward at an angle from the plane across the face of the steering wheel and the knobs of Laubach do not deform out of interference with the operation of the steering wheel as set forth in claim 14.

Applicant has demonstrated that claim 14 is not anticipated (or rendered obvious) by Laubach and requests that the anticipation rejection based on this patent be withdrawn.

Claims 18 and 19/18 depend from claim 14. As such, each of these dependent claims includes all the features of claim 14. Therefore, claims 18 and 19/18 are not anticipated by Laubach for the same reasons that claim 14 is not anticipated by this patent. Therefore, Applicant has traversed the Examiner's bases for rejecting claims 18 and 19/18 for anticipation and respectfully requests that this rejection be withdrawn.

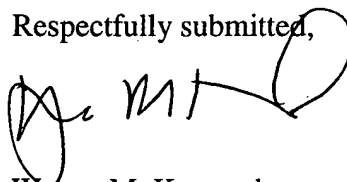
III. Conclusion

In this Response, Applicant has traversed Examiner's (i) objection to the drawings, (ii) objection to the specification, (iii) and anticipation rejections under 35 U.S.C. 102(b) based on either Van Arsdell, U.S. Patent No. 2,118,540; Anson, U.S. Patent No. 2,134,020; and Laubach, U.S. Patent No. 1,575,848. As such, Applicant has placed the present application in condition for allowance.

The present invention is new, non-obvious and useful. Reconsideration and allowance of the claims are respectfully requested.

Dated: June 12, 2006

Respectfully submitted,

A handwritten signature in black ink, appearing to read "Wayne M. Kennard", written over a horizontal line.

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IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of: Wilson

Examiner: Vinh Luong

Serial No.: 10/727,306

Art Unit: 3682

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For: FATIGUE RELIEVING SUPPORT FOR STEERING WHEELS AND
THE LIKE

Mail Stop Amendment
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

RESPONSE

Sir:

Applicant submits the following timely-filed Response to the Office Action dated March 30, 2006 and June 21, 2006. Please amend the application as provided below.

This Response places the application and the claims therein, in condition for allowance. In this Response, the amendments to the specification begin on page 2, the amendment to the claims begin on page 5, and the Remarks begin on page 8.

Specification:

Page 2, please rewrite the third full paragraph as follows:

The system of the present invention will include at least one part that extends outward at an angle from a plane across the face of the steering wheel or vehicular control. This part is at least partially deformable in at least one direction, so that the system will not interfere with the operation of the wheel or control. This deformability, however, will not impede the support function of the system on the invention. Furthermore, the deformable material has memory, so that after a deforming force is removed, it resumes its original predeformation configuration and shape, which is extending outward at an angle from a plane across the face of the steering wheel or vehicular control.

Page 3, please rewrite the seventh full paragraph as follows:

Deformable ~~material~~ second section 102 extends outward from steering control 105 over a predetermined section of the steering control, which is shown in Figure 1 to be an arc. As is better shown in Figure 3, a deformable second section such as 102 extends outward at an angle from a plane across the face of a steering control such as 105. Deformable second section 102 may extend outward from the steering control at or below the inside circumference of the control over the predetermined arc. This arc will typically include at least the ten 104 and two 106 o'clock positions, or may include the entire circumference.

Page 4, please rewrite the fourth and fifth full paragraphs as follows:

The first system of the present invention at 202 includes first section 204 that connects to steering control 211 and second section 205 that extends outward from first section 204. Further, a second section such as 205 extends outward at an angle from a plane across the face of a steering control such as 211 (see Figure 3). First section 204 may be rigid, semi-rigid, or deformable, while second section 205 is deformable. If the first section is deformable, it may have memory.

Similarly, the second system of the present invention at 203 includes first section 207 that connects to steering control 211 and second section 209 that extends outward

from first section 207. Further, a second section such as 209 extends outward at an angle from a plane across the face of a steering control such as 211 (see Figure 3). First section 207 may be rigid, semi-rigid, or deformable, while second section 209 is deformable. Again, if the first section is deformable, it may have memory. Further, second sections 205 and 209 may be rigid, semi-rigid or flexible, or non-deformable and still be within the scope of the present invention.

Page 5, please rewrite second full paragraph as follows:

Referring to Figure 3, generally at 300, steering control 305 is shown that includes rim 308, spokes 310, and steering column 312. First section 301 is formed integral with rim 308 and deformable second section 302 extends outward from the first section. As is shown, second section 302 extends outward at angle 316 from plane 318 across the face of steering control 305. The material of second section 302 has sufficient strength that when driving, the driver may rest his/her wrists or portions of the hands 322 on the material and they will be supported. The structure is such that the weight of the arms and hands through the wrists or portions of the hands are supported without the material deforming.

Page 6, please rewrite the second and third full paragraphs as follows:

Referring to Figure 5, generally at 500, a second embodiment of the present invention is shown. System 501 of the present invention shown in Figure 5 includes a first section 502 that detachably connects to steering control rim. Deformable second section 503 connects to, and extends outwardly from, first section 502. As is shown, deformable second section 503 extends outward at angle 516 from plane 518 across the face of steering control rim 508. First section 502 may snap-on or otherwise attach to the steering control such that it may appear integral with the steering control. One of many possible known means for accomplishing this is by first section 502 being mostly rigid, and leaving a space 507 so the attachment can be forced over rim 508 and leave room for the steering control spokes 510. Regardless of the means for attachment, once first section 502 is attached to the steering control, it will provide all of the benefits that have been described for the first section being integrally formed with the rim. Additionally,

the second embodiment, may be a single structure with a single resting material support, a single structure with multiple resting supports, or multiple structures each with its own resting support. As in the other embodiments, the second section may be rigid, semi-rigid or flexible, or non-deformable and still be within the scope of the present invention.

By way of example, Figure 6, generally at 600, shows another alternate method to attach the system of the present invention to steering control rim 608. The system in this figure has first section 602 that will envelop rim 608. First section 602 may be made from a flexible material. First section 602 may have a slit 611, which after this section envelops the rim, may be stitched shut by stitches 613. As in the other embodiments of the present invention, deformable second section 603 connects to, and extends outwardly from, first section 602. Further, a deformable second section such as 603 extends outward at an angle from a plane across the face of a steering control rim such as 608 (see Figures 3 and 5). Again, the second section may be rigid, semi-rigid, or non-deformable and still be within the scope of the present invention.

In the Claims

Claims 1-13. (cancelled)

14. (Previously Amended) A fatigue relieving/preventing apparatus associated with a steering wheel for controlling a vehicle, comprising:

a first section that connects to a peripheral portion of the steering wheel; and
a rigid, semi-rigid or flexible, or non-deformable second section that connects to, and extends from the first section at the peripheral portion of the steering wheel, the second section extends from the first section outward at an angle to a plane across a front face of the steering wheel, the second section for supporting at least a portion of a vehicular operator's body when pressure from the portion of the vehicular operator's body on the second section is less than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel, and deforming out of interference with the vehicular operator's ability to operate the steering wheel when pressure from the portion of the vehicular operator's body on the second section is equal to or greater than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel.

15. (Currently Amended) The apparatus as recited in claim 14, wherein the steering wheel includes ~~a~~ the steering wheel for controlling at least a nautical vessel, aircraft, or ground transportation vehicle.

16. (Previously Added) The apparatus as recited in claim 14, wherein the portion of the body supported by the second section includes at least a forearm, wrist, or hand.

17. (Currently Amended) The apparatus as recited in claim 14, wherein the first section extends a predetermined length of ~~a predetermined~~ the peripheral portion of the steering wheel.

18. (Previously Amended) The apparatus as recited in claim 14, wherein the second section includes at least two second sections that each connect to the first section at separate locations.

19. (Previously Added) The apparatus as recited in claim 17 or 18, wherein the first section is deformable.

20. (Previously Added) A fatigue relieving/preventing apparatus associated with a steering wheel for controlling a vehicle, comprising:

at least two discrete first sections that each connect to a peripheral portion of the steering wheel, and

a discrete rigid, semi-rigid or flexible, or non-deformable second section that connects to, and extends from each first section at a peripheral portion of the steering wheel, each second section extends from the first section outward at an angle to a plane across a front face of the steering wheel, each second section for supporting at least a portion of a vehicular operator's body when pressure from the portion of the vehicular operator's body on the second section is less than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel, and deforming out of interference with the vehicular operator's ability to operator the steering wheel when pressure form the portion of the vehicular operator's body on the second section is equal to or greater than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel..

21. (Previously Added) The apparatus as recited in claim 20, wherein the steering wheel includes a steering wheel for controlling at least a nautical vessel, aircraft or ground transportation vehicle.

22. (Previously Added) The apparatus as recited in claim 20, wherein the portion of the body supported by the second section includes at least a forearm, wrist, or hand.

23. (Previously Added) The apparatus as recited in claim 20, wherein the apparatus is adjustable for supporting different sizes or types of body portions.

24. (Previously Added) The apparatus as recited in claim 14 or 20, wherein each first section is formed integral with the steering wheel.

25. (Previously Added) The apparatus as recited in claim 14 or 20, wherein each first section is detachable from the steering wheel.

26. (Previously Added) The apparatus as recited in claim 20, wherein each first section is deformable.

27. (Previously Added) The apparatus as recited in claim 14, wherein the first section is flexible, rigid, or semi-rigid, or non-deformable.

28. (Previously Added) The apparatus as recited in claim 20, wherein the first section is flexible, rigid, or semi-rigid, or non-deformable.

Remarks

I. Introduction

Applicant is in receipt of the Office Action dated at March 30, 2006. Claims 14-19, 24/14, and 27 are pending in the present application. The Examiner has recited several grounds for objecting to and rejecting the present application. Examiner objected to the drawings for not including representations to the angular disposition of second section of the fatigue/relieving apparatus. In view of this objection to the drawings, the Examiner objected to the specification. The Examiner also has objected to claims 14-19, 24/14, and 27 for indefiniteness under 35 U.S.C. 112, second paragraph. Lastly, the Examiner rejected pending claims 14-19, 24/14 and 27 under 35 U.S.C. 102(b) for anticipation based on either Van Arsdel, U.S. Patent No. 2,118,540; Anson, U.S. Patent No. 2,134,020; or Laubach, U.S. Patent No. 1,575,848. Applicant will demonstrate herein that the objections and rejections have been overcome by this Response, thereby placing the present application in condition for allowance.

II. The Corrected Drawings Overcome the Examiner's Objection

On page 3 of the Office Action, the Examiner objected to the drawings because "each part of the invention, e.g., the angle and the face in claim 14 should be designated by a reference numeral or character." Applicant has corrected the drawings as requested by the Examiner (Attachment B). Applicant respectfully submits six (6) Replacement Sheets of drawings. These changes to the drawings do not add new matter. As such, Applicant has traversed the Examiner's basis for objection to the drawings.

III. The Specification, As Amended, Overcome the Examiner's Objection

On page 4 of the Office Action, the Examiner objected to the specification for "failing to provide proper antecedent basis for the claimed the subject matter, such as, 'an angle,' in claim 14." Applicant has amended the specification to overcome this objection. These amendments do not add new matter. Therefore, this objection should be withdrawn.

IV. The Claims, As Amended Are Definitive.

On page 3 of the Office Action, the Examiner contends that the terms “rigid,” “semi-rigid,” “flexible,” or “non-deformable” in claims 14 and 17 are indefinite. Applicant submits that these terms would be understood by a person of ordinary skill in the art in light of the present invention.

The Examiner contends that 14 and 17 are indefinite under 35 U.S.C. §§ 112, second paragraph, because of the recitation of the terms “rigid,” “semi-rigid,” “flexible,” and “non-deformable.” In particular, the Examiner asserts that these terms are indefinite because these terms “[are] not defined by the claim, the specification does not provide a standard for the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention.” Further, the Examiner contends that “it is unclear what range of Rockwell hardness of the material of the second section is required in order to be considered as terms “rigid,” semi-rigid, or flexible, or non-deformable.” Applicant submits that the claims are definite as will be shown.

Claims 14 and 17, include the terms “rigid,” “semi-rigid,” “flexible,” and “non-deformable.” Applicant has attached as Attachment A excerpts from the Ninth New Collegiate Dictionary. These excerpts demonstrate that each of the terms that the Examiner has contended is indefinite is a very common term that a person of ordinary skill in the art would understand with sufficiency to make and use the present invention. The attached excerpts make plain that a person of ordinary skill in the art would clearly understand the scope of the claims when “rigid,” “semi-rigid,” or “flexible,” or “non-deformable,” is used. As such, claims 14 and 17 would be definite in the hands of a person of ordinary skill in the art. Noting this, Applicant overcomes the Examiner’s indefiniteness rejection under 35 U.S.C. § 112, second paragraph, as to the use of the terms “rigid,” “semi-rigid,” “flexible,” and “non-deformable,” and respectfully requests that this rejection be withdrawn with regard to claims 14 and 19.

The Examiner also rejected claims 15 and 17 for allegedly having no anticipated basis for the terms “a steering wheel” and “a peripheral portion of the steering wheel,” respectively. Applicant has amended the claims to remove any possible confusion on the part of the Examiner with regard to overcoming this obviousness rejection.

Noting the foregoing, Applicant has traversed each of the Examiner's basis for rejecting the claims for indefiniteness under 35 U.S.C. 112, second paragraph.

V. Claims 14-19 Are Not Anticipated Under 35 § U.S.C. 102(b)

Claims 14-19, 24/14 and 27 are pending in the present application. In the current Office Action, claims 14-19, 24-14 and 27 have been rejected by the Examiner for anticipation under 35 U.S.C. § 102 (b) based on a three references. These references are U.S. Patent No. 1,575,848 to Laubach ("Laubach"), U.S. Patent No. 2,118,540 to Van Arsdel ("Van Arsdel"), and U.S. Patent No. 2,134,020 to Anson ("Anson"). More specifically, the Examiner relied on Van Arsdel or Anson for rejecting claims 14-17, 19/17, 24/14 and 27; and Laubach for rejecting claims 14, 18 and 19/18. Hereinafter, Applicant will demonstrate that claims 14-19, 24/14, and 27, as presently amended, place the present application in condition for allowance and the application should be passed to issue.

A. Applicable Law

In order for there to be anticipation under 35 U.S.C. §102, a single prior art reference must show each and every feature of the claimed invention in the same way. . *Brown v. 3M*, 265 F.3d 1349, 1351 (Fed. Cir. 2001) ("To anticipate, every limitation of the claimed invention must be found in a single prior art reference, arranged as in the claim"); *Kloster Speedsteel AB v. Crucible, Inc.*, 793 F.2d 1565, 1571 (Fed. Cir. 1986) ("absence from the reference of any claimed element negates anticipation"). Applicant submits that neither Van Arsdel, Anson, nor Laubach satisfy this standard for finding anticipation under 35 U.S.C. § 102(b).

B. Van Arsdel Does Not Anticipate Claims 14-19, 24/14, and 27

Claim 14 is an independent claim and claims 15-19, 24/14, and 27 depend from claim 14. As such, claims 15-19, 24/14, and 27 add features to claim 20.

In relying on Van Arsdel, the Examiner does not cite to any descriptions of the auto steering wheel handgrip disclosed in this reference but annotates the drawings for this purpose. Specifically, the Examiner annotated Figures 3 and 5 in an attempt to show what is being claimed in claim 14. The Examiner states that reference no. 4 equates to the first section and reference no. 2 equates to the second section of claim 14. Applicant submits that the Examiner fails to consider and appreciate all of the elements of the

second section because if he did, two things would be clear (i) the grip-rest is in a plane parallel with the one across the face of the steering wheel and (ii) there is a missing element.

Van Arsdel at column 2, lines 13-54 states:

The grip-rest 2 is concave longitudinally and about half of the rest extends over and part way across the steering wheel rim 3 in a manner to slope downwardly and inwardly of the rim. The outer edge 4 on the side, and 5 of the rear end of the concave, located above the rim, extends up into a marginal flange to be contacted by the inside of the ball of the thumb or by the bottom of the hand, depending upon which part of the hand is seated on the rest. These flanges 4 and 5 enable the operator instantly to feel any deviation of the car from a straight course and gives him something substantial to push against in resistance and also in rotating the wheel to steer the car around corners and curves and away from obstructions or bad places in the roadway.

The rotation of the steering wheel by hand pressure against the flanges 4 and 5 is assisted by the palm and fingers, which are wrapped around the rim of the wheel, and increase the fingerhold [on] the grip-rest 2, which is thickened and bifurcated to straddle the rim as shown in Fig. 6, is provided with recesses separated by ridges, here shown as three in number, 6, 7, and 8.... [See Figure 4]

The weight of the hand and arm are comfortably supported with the bottom of the hand resting in the concavity of the grip-rest as shown in Fig. 1, or with the ball of the thumb seated in the concavity as shown in Fig. 2....

My improved grip-rest may be formed integral with the rim of the steering wheel as shown in Fig. 8, but I prefer to make it removable as an attachment for any make of car and also to make it adjustable to suit the requirements or fancy of the driver. [Emphasis added]

A review of Figures 3 and 5, as annotated by the Examiner, attempts to show that the grip-rest of Van Arsdel is disposed outward at an angle α to a plane across the face of the steering wheel shows that the Examiner's position is misplaced. As the description above from Van Arsdel indicates, the grip-rest is disposed as shown in Figure 6 parallel to the plane across the face of the steering wheel not at angle to it. This is very clear because in each disposition of the grip-rest in the Figures, it is fixed in this parallel plane to support the thumb or part of the palm. It is also fixed so that it is not deformable so the driver can put extensive pressure on it (and it will not move) for steering the automobile (See underscored sections in the quotation above).

If the grip-rest were supposed to be at an angle commensurate with the present invention as the Examiner contends, its disposition would be shown differently in the drawings. As such, there is not support for the Examiner's contention that the grip-rest is disposed other than in the plane parallel to the plane across the form of the steering wheel. Accordingly, one skilled in the art would not understand the grip-rest in Van Arsdel to be disposed as the Examiner contends.

There is also no support in the description of the grip-rest in Van Arsdel that it will deform in any way out of interference with the operation of the steering wheel. Applicant submits he is justified in taking this position given the description of the connection of the grip-rest as shown in Figure 6 or the integrally formed grip-rest shown in Figure 8. Therefore, the grip-rest of Van Arsdel would not anticipate the invention as set forth in claim 14 because it is missing at least one element, i.e., Van Arsdel at least does not teach or suggest the features of the second section being deformable out of interference with the operation of the steering wheel as set forth in claim 14.

Noting in the foregoing, Applicant has demonstrated that the auto steering wheel grip-rest of Van Arsdel does not anticipate (or render obvious) the invention of claim 14. Accordingly, Applicant respectfully requests that the anticipation rejection based on Van Arsdel be withdrawn.

Claims 15-17, 19/17, 24/14, and 27 depend from claim 14. As such, each of these dependent claims includes all the features of claim 14. Therefore, claims 15-17, 19/17, 24/14, and 27 are not anticipated by Van Arsdel for the same reasons that claim 14 is not anticipated by this patent. Thus, Applicant has traversed the Examiner's basis for rejecting claims 15-17, 19/17, 24/14, and 27 for anticipation and respectfully requests that this rejection be withdrawn.

C. Anson Does Not Anticipate Claims 14-17, 19/17, 24/14, and 27

The Examiner has rejected claims 14-17, 19/17, 24/14, and 27 for anticipation based on Anson. Referring to the Figures of Anson, the Examiner states that reference no. 13 equates to the first section and reference no. 11 equates to the second section of claim 14. The Examiner has annotated Figure 8 to indicate that the steering wheel attachment of Anson is disposed at an angle α with respect to a plane across the face of

the steering wheel. Before addressing the Examiner's basis of rejection, Applicant submits that the description of the steering wheel attachment of Anson is germane to the Examiner's position on anticipation. Applicant also submits that if this description is taken into consideration, the Examiner should withdraw the anticipation rejection based on Anson.

In the description of the purpose of the steering wheel attachment in Anson, the patent states (Page 1, left column, lines 6-25):

I have found that in the driving of an automobile and particular when driving for extended periods of time over long distances, the normal manner of holding and manipulating the steering wheel, wherein both driver's hands grasp the wheel in positions which require the driver's arms to remain in a raised and more or less unnatural and uncomfortable position, considerable strain develops in the driver's hands, arms, shoulders and back particularly, and results in excess of fatigue, such as will frequently dull the driver's normal reflexes and alertness and thereby increase the danger of accidents.

To obviate these disadvantages, I have devised an attachment for steering wheels, which permits a driver to assume a completely comfortable and relaxed driving position, while at the same time, affords a means permitting the driver to at all times retain positive operating control of the steering wheel. [Emphasis added]

The steering wheel attachment of Anson is subsequently described in the patent. The following description is stated (Page 1, right column, line 49 – Page 2, left column, line 18):

The attachment comprises a hand grip portion 11, which is preferably of bulbular form.... Grip portion 11 normally extends downward from the wheel rim and is of suitable length to adapt same to extend to the region of the driver's lap so that it may be grasped by the driver's hand when his hand is resting in a normal comparable position in his lap. Grip portion 11...which will have sufficient pliability...to be deflected from its normal pendant position without adversely affecting the measure of control of the steering wheel movements afforded by the positive operating movement of the attachment, while at the same time, neck 12 will retain sufficient rigidity to permit operating movements of hand grip 11 to be positively communicated to the steering wheel rim for effective control of its movements. [Emphasis added]

Applicant submits that the steering wheel attachment of Anson does disclose all of the elements of claim 14. As set forth in the quotation above, the steering wheel attachment of Anson is a pliable structure that dangles downward from the bottom of the

steering wheel. It is further understood from the quotation above that in use the steering wheel attachment is grasped by the driver's hand while the arms and hands are resting in the driver's lap. There is no teaching in Anson that the steering wheel attachment can be disposed of any location other than at the bottom of the steering wheel where it dangles for use. The other dispositive of the hand grip at the top of rim is for situations where it is removed from use.

The Examiner has cited Anson at Page 2, Left Column, Lines 62-72, as teaching the deformability element of the second section in claim 14. As the quotation above demonstrates, when the Anson handgrip is in use, it is in the pendent position and used to steer the vehicle. If, during normal operations, the driver were to grab the steering wheel in an emergency situation, he would release the handgrip and grab the wheel, for example, at the 10 and 2 o'clock positions. In doing so, the pendent-hanging handgrip would not be deformed as set forth in claim 14 because it would not be in use. Moreover, if it were used, it would not be deformed out of interference but would be held to steer the vehicle.

The Examiner has stated the handgrip of Anson equates to deformation according to claim 14 because it may be moved from the bottom pendent position to the top of the steering wheel. When the handgrip is moved to the top, it is moved there to be purposefully out of use all the time so it will not be in a position to be deformed as set forth in the second section of claim 14.¹ In order to move the handgrip, it would be understood that the vehicle would have to be stopped, the handgrip detached and repositioned at the top, and reattached.

Given the foregoing, the steering wheel attachment of Anson at least does not indicate the element of the second section being disposed outward at an angle from the plane across the face of the steering wheel (Anson extends rearward) and it does not teach that the attachment will be deformable out of interference with the operation of the steering wheel as set forth in claim 14.

Applicant has demonstrated that claim 14 is not anticipated (or rendered obvious) by Anson and requests that the anticipation rejection based on this patent be withdrawn.

¹ Anson, page 2, left column, lines 68-72.

Claims 15-17, 19/17, 24/14, and 27 depend from claim 14. As such, each of these dependent claims includes all the features of claim 14. Therefore, claims 15-17, 19/17, 24/14, and 27 are not anticipated by Anson for the same reasons that claim 14 is not anticipated by this patent. Applicant has traversed the Examiner's basis for rejecting claims 15-17, 19/17, 24/14, and 27 for anticipation and respectfully requests that this rejection be withdrawn.

D. Laubach Does Not Anticipate Claims 14, 18, and 19/18

The Examiner has rejected claims 14, 18, and 19/18 for anticipation based on Laubach. In formulating the rejection based on Laubach, the Examiner has not relied on any part of the disclosure in that patent but has annotated the drawings to allegedly show that Laubach teaches each and every feature of claim 14. The Examiner states that reference nos. 7 and 8 of the knob 2 equates to the first section and reference no. 10 equates to the second section of claim 14. Applicant submits that the Examiner's reliance on Laubach is misplaced.

Laubach states the following with regard to the knobs attached to the steering wheel (Page 1, line 43 – 71):

By particularly considering the Figures 2 and 3, it will be seen that the knobs 2 are secured to the rim of the wheel 1 by means of securing screws 4, these screws being threaded as indicated at 5 longitudinally through the knobs 2, and extending for quite a distance through the entire length of the knobs, thereby efficiently bracing the same. The inner ends of the knobs 2 are concave as indicated at 6, so as to conform to the contour of the outer periphery of the wheel 1....

Each knob 2 is provided with a plurality of finger sockets 9 upon the upper face thereof, and an enlarged head portion 10 at the outer end thereof, for the purpose of facilitating the gripping of the knob and preventing the actual slippage of the hand of the operator from the knob 2. [Emphasis added]

The Examiner has annotated the drawings to attempt to show that enlarged head 10 is disposed outward at an angle from the plane across the face of the steering wheel. This is not supported.

The hands of the driver are supported by gripping the knobs in the defined finger recesses shown in the drawings. The heads 10 are enlarged for this sole purpose of preventing the hands from slipping off of the knobs. The heads 10 clearly are not

disposed at an angle outward of the plane across the face of the steering wheel but are placed at the end of the knobs solely to act as a stop. Further, the heads 10 are not deformable out of interference with the operation of the steering wheel as set forth in claim 14. They are fixed in place along with the rest of the knobs.

The description of the knobs and a review of the Figures makes plain that the knobs are not deformable and they are not disposed at an angle with respect to the a plane across the face of the steering wheel. The knobs are rigidly connected to the steering wheel by screws 5. Any movement of them requires removing the screws, drilling the wheel at a new location, and reattaching the knobs at the new location. At this new location, the knobs will in a plane parallel to the plane across the face of the steering wheel.

The knobs do not deform out of interference with the operation of the steering wheel as in the second section of claim 14. In fact, once the Laubach knobs are secured by screws 5 as shown and described, they are fixed and not movable during normal operations. If they are not unscrewed, the only movement would be to apply a destructive force to the knobs, thereby breaking them.

Therefore, Laubach at least does not teach the features of the second section being disposed outward at an angle from the plane across the face of the steering wheel and the knobs of Laubach do not deform out of interference with the operation of the steering wheel as set forth in claim 14.

Applicant has demonstrated that claim 14 is not anticipated (or rendered obvious) by Laubach and requests that the anticipation rejection based on this patent be withdrawn.

Claims 18 and 19/18 depend from claim 14. As such, each of these dependent claims includes all the features of claim 14. Therefore, claims 18 and 19/18 are not anticipated by Laubach for the same reasons that claim 14 is not anticipated by this patent. Therefore, Applicant has traversed the Examiner's bases for rejecting claims 18 and 19/18 for anticipation and respectfully requests that this rejection be withdrawn.

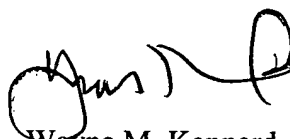
III. Conclusion

In this Response, Applicant has traversed Examiner's (i) objection to the drawings, (ii) objection to the specification, (iii) and anticipation rejections under 35 U.S.C. 102(b) based on either Van Arsdell, U.S. Patent No. 2,118,540; Anson, U.S. Patent No. 2,134,020; and Laubach, U.S. Patent No. 1,575,848. As such, Applicant has placed the present application in condition for allowance.

The present invention is new, non-obvious and useful. Reconsideration and allowance of the claims are respectfully requested.

Dated: June 26, 2006

Respectfully submitted,

A handwritten signature in black ink, appearing to read "Wayne M. Kennard", written over a circular stamp or seal.

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CASE (rigidly defined property lines) b : to make distinct, clear, or detailed in outline (the issues aren't too well defined) 3: CHARACTERIZE DISTINGUISH (you ~ yourself by the choices you make — Denison Univ. Bull.) ~ v ~ ly n : to make a definition — defin-able \-'fi-n-ə-bəl/ adj
de-fine-i-tion \-'bi-ē/ adv — definition \-'fin-mənt/ n — definer \-'fī-nər/ n
de-fin-e-lendəm \di-'fin-ē-'en-dəm/ n, pl -də \-'dɔ-/ [L. something to be defined, neut. of definiendus, gerundive of definire] (1871): an expression that is being defined
de-fin-i-ens \di-'tin-ē-'enz/ n, pl de-fin-i-en-tia \di-'fin-ē-'en-ch(ē)-jə/ [L. pres. p. of definire] (1871): an expression that defines: DEFINITION
de-fi-nite \de-'fai-nət/ adj [L. definitus, pp. of definire] (1553) 1: having distinct or certain limits (see ~ standards for pupils to meet) 2 a: free of all ambiguity, uncertainty, or obscurity (demanded a ~ answer) b: UNQUESTIONABLE, DECIDED (the quarterback was a ~ hero today) 3: typically designating an identified or immediately identifiable person or thing (he ~ article the) 4 a: being constant in number, value, less than 20, and occurring in multiples of the petal number (Stamens ~) b: CYMOSE syn see EXPLICIT — defi-nite-ly adv — definite-ness n
definite integral n (1860): a number that is the difference between the values of the indefinite integral of a given function for two values of the independent variable
def-ini-tion \de-'fai-nish-ən/ n [ME diffinitioin, fr. MF definitioin, fr. L. definitioin-, definitio, fr. definitus, pp.] (14c) 1: an act of determining; specif.: the formal proclamation of a Roman Catholic dogma 2 a: a statement expressing the essential nature of something (as by differentiation within a class) b: a statement of the meaning of a word or word group or a sign or symbol (dictionary ~) c: a product of defining 3: the action or process of stating or formulating a definition 4 a: the action or the power of describing, explaining, or making definite and clear (the ~ of a telescope) (her comic genius is beyond ~) b (1): distinctness of outline or detail (as in a photograph) (2): clarity esp. of musical sound in reproduction c: sharp demarcation of outlines or limits (a jacket with definite waist ~) — defi-ni-tion-al \-'nish-nəl-, '-nish-ən-/ adj
de-fin-i-tive \di-'fin-ti-v/ adj [ME diffiniiv, fr. MF definitif, fr. L. definitivus, fr. definitus] (14c) 1: serving to provide a final solution (A ~ factuality) 2: authoritative and apparently exhaustive (a ~ biography) 3: serving to define or specify precisely (a ~ stamp which is regularly differentiated or developed 5 of a postage stamp: issued as a regular stamp for the country or territory in which it is to be used syn see CONCLUSIVE — de-fin-i-tive-ly adv — de-fin-i-tive-ness n
definitive n (1951): a definitive postage stamp — compare PROVISIONAL
definitive host n (1901): the host in which the sexual reproduction of a parasite takes place
de-fi-ni-tize \de-'fai-nā-z/ v, de-fi-nā-z \v -tized; -tiz-ing/ (1876): to make definite
de-fi-ni-tude \di-'fin-ə-'tyūd/, '-fi-nə-'n/ [irreg. fr. definitie] (1836): PRECISION, DEFINITENESS
de-fla-grate \de-'fla-'grāt/ vb -grat-ed; -grat-ing [L. desflagratus, pp. of deflagrare to burn down, fr. de- + flagrare to burn — more at BLACK] (1727): to cause to deflagrate — compare DETONATE ~ vi: to burn rapidly with intense heat and sparks being given off — de-fla-gration \de-'fla-'grā-shən/ n
de-flate \di-'flāt/ de- \v de-flated; de-flating [de- + flate (as in inflate)] v (1891) 1: to release air or gas from 2: to reduce in size or importance (~ his ego with cutting remarks) 3: to reduce (a price level) or cause (a volume of credit) to contract ~ vi: to lose firmness through or as if through the escape of contained gas syn see CONTRACT — de-fla-tor \-'flāt-ər/ n
de-fla-tion \di-'flā-shən, -dē-'flā-'n/ (1891) 1: an act or instance of deflating: the state of being deflated 2: a contraction in the volume of available money or credit that results in a decline of the general price level 3: the erosion of soil by the wind — de-fla-tion-ary \-'shā-'ner-/ adj
de-flect \di-'flek-t/ vb [L. deflectere to bend down, turn aside, fr. de- + flectere to bend] v (1555): to turn from a straight course or fixed direction: BEND ~ vi: to turn aside: DEVIATE — de-flect-a-ble \-'flek-tə-bəl/ adj — de-flec-tive \-'ti-v/ adj — de-flec-to-ry \-'tɔ-ri/ n
de-fla-tion \di-'flek-shən/ n (1605) 1: a turning aside or off course: DEVIATION 2: the departure of an indicator or pointer from the zero reading on the scale of an instrument
de-flexed \de-'fleks-t/, di- \adj [L. flexus, pp. of deflectere] (1826): turned abruptly downward (a ~ leaf)
de-flora-tion \de-'flō-'rā-shən, -dē-'flō-'n/ [ME defloracioun, fr. LL defloratio-, defloratio, fr. defloratus, pp. of deflorare] (15c): rupture of the hymen
de-flow-er \('dē-'flau-(ə-)r/ v [ME deflower, fr. MF or LL MF deflorare, fr. LL deflorare, fr. L. de- + flor-, des flower, more at BLOW] (14c) 1: to deprive of virginity: RAVISH 2: to take away the prime beauty of — de-flow-er-er n
de-foam \('dē-'fōm/ v (1939): to remove foam from: prevent the formation of foam in — de-foam-er n
de-log \('dē-'lɔg; -'tlɔg/ v (1904): to remove fog or condensed moisture from — de-log-ger n
de-loi-lant \('dē-'lɔi-lənt/ n (1943): a chemical spray or dust applied to plants in order to cause the leaves to drop off prematurely
de-loi-late \-'le-'it/ n [LL de-foliatus, pp. of defoliare, fr. L. de- + folium leaf — more at BLADE] (1791): to deprive of leaves esp. prematurely
de-loi-li-a-tion \('dē-'lɔi-lē-'ā-shən/ n — de-loi-li-a-tor \('dē-'lɔi-lē-'āt-ər/ n
de-force \('dē-'fɔs-(ə)s, -'fɔs-(ə)s/ n [ME deforcen, fr. MF deforcier, fr. de- + forcier to force] (15c) 1: to keep (as lands) by force from the rightful owner 2: to eject (a person) from possession by force — de-force-ment \-'fɔr-smənt-, '-fɔr-/ n
de-for-clant \-'fɔr-shənt-, '-fɔr-/ n [AF, fr. OF: prp. of deforcier] (15c) one who deforces the rightful owner
de-for-es-ta-tion \('dē-'fɔr-ə-'stā-shən, -'fār-/ n (1874): the action or process of clearing of forests; also: the state of having been cleared of forests — de-for-est \('dē-'fɔr-'est-, '-fār-/ v
de-form \di-'fɔrm/ de- \v (ME deformen, fr. MF or LI MF deformer, fr. L. deformare, fr. de- + formare to form; fr. forma form) v (15c) 1:

to spoil the form of. 2 a: to spoil the looks of: DISTORT ~ed by bitterness). b: to make hideous or monstrous. 3: to shape or by stress ~ w: to become misshapen or changed. *syn* DEFORM, DISTORT, CONTORT, WARP mean to mar or spoil by twisting: DEFORM may imply a change of shape through injury, or some accident of growth; DISTORT and CONTORT by wrenching from the natural, normal, or justly proportioned form: TORT suggests a more involved twisting and a more grove painful result; WARP indicates physically an uneven shrill bends or twists out of a flat plane.

de-form-al-ize ('dē-fōr-mā-līz) v (1880): to make less formal
de-for-ma-tion ('dē-fōr-mā-shən, -dēf-ər-) n (15c) 1: a form or shape; also: the product of such alteration 2: the deforming of the state of being deformed 3: change for the de-for-ma-tion-al 'shnəl, -shən-'l) adj
de-for-ma-tive ('dē-fōr-mat-iv) adj (1641): tending to deform
de-formed adj (15c): distorted or unshapely in form: MISAPPLIED
de-for-mity ('di-fōr-mə-tē) n, pl -ties [ME *deformite*, fr. MF *deformitas*, *deformatas*, fr. *deformis* deformed, fr. *de-* (15c) 1: the state of being deformed. 2: a physical blemish or distortion: DISFIGUREMENT 3: a moral or aesthetic flaw or defect
de-fraud ('dē-frōd) v [ME *defrauden*, fr. MF *defrauder*, *fraudare*, fr. *de-* + *fraudere* to cheat, fr. *fraud-*, *fraus* fraud, deprive of something by deception or fraud. *syn* see CHEAT
de-fra-da-tion ('dē-frō-dā-shən) n — de-fraud-er ('di-frōd-ər) n
de-fray ('di-trā) v [MF *desfrayer*; fr. *des-* *de-* + *frayer* to OF, fr. (assumed) *Ofr* expenditure, lit., damage by breach, neut. of *fractus*, pp. of *frangere* to break ~ more (1543) 1: to provide for the payment of: PAY 2 archaic: expenses of ~ de-fray-able '-abəl) adj — de-fray-al '-frā(-s)

de-frock ('dē-frōk) v (1581): UNFROCK
de-frost ('dē-frōst, -dē-) v (1895) 1: to release from a frozen meat 2: to free from ice (~ the refrigerator) ~ w: to thaw from a deep-frozen state — de-frost-er n
deft /'dest/ adj [ME *defte*] (15c): marked by facility and skill DEXTEROUS — deftly adv — deftness 'dest(t)-nəs) n
de-funct ('di-fanj(ŋ)t) adj [L *defunctus*, fr. pp. of *defungi* to die de- + *fungi* to perform ~ more at FUNCTION] (1599): having the course of life or existence (her ~ aunt's will) (the commi ~) *syn* see DEAD
de-fuse ('dē-fyüz) v (1943) 1: to remove the fuse from (a bomb) 2: to make less harmful, potent, or tense: CALM ~
de-fly ('di-flī) v; de-fied; de-fying [ME *desfen* to renounce challenge, fr. MF *defier*, fr. *de-* + *fier* to enlist, fr. (assumed) alter. of L *fidere* to trust ~ more at AIDE] (14c) 1 archaic: engage to combat 2: to challenge to do something considerable: DARE 3: to confront with assured power of resistor GARD (~ public opinion) 4: to resist attempts at: WITH paintings ~ classification
de-fly ('di-flī, -dē-, n, pl defies (1580): CHALLENGE, DEFIANCE
de-gage ('dē-gā-'zhā) adj [F, fr. pp. of *dégaquer* to redeem a card, OF *degager*, fr. *des-* *de-* + *gager* pledge ~ more at GAGE] free of constraint: NONCHALANT 2: being free and easy with a ~ look 3: extended with toe pointed in preparatory ballet step
de-gas ('dē-gās) v (1920): to remove gas from (~ an effect de Gaullism [*di-gō-liz-am*, -'gō- n (1943): GAULLISM ~
~last-) n
de-gauss ('dē-gaus') v [*de-* + *gauss*, after Karl F. Gauss] () to make (a steel ship) effectively nonmagnetic by means coils carrying currents that neutralize the magnetism of: DEMAGNETIZE — de-gauss-er n
de-gen-er-a-cy ('di-jen-(ə-)rā-sē) n, pl -cies (1664) 1: the st degenerate 2: the process of becoming degenerate 3: session 4: the coding of an amino acid by more than one c genetic code
de-gen-er-ate ('di-jen-(ə-)rāt) adj [ME *degenerat*, fr. L *degenerare* to degenerate, fr. *de-* + *gener-*, *genus* race, k at KIN] (15c) 1 a: having declined (as in nature, character, or function) from an ancestral or former state b: having condition below that which is normal to a type; esp.: lower and usu. peculiarly corrupt and vicious state c: being mathematically simpler (as by having a factor equal to zero) than the typical case (the graph of a second tion yielding two intersecting lines is a ~ hyperbola) 3 ized by atoms stripped of their electrons and (by a very matter): also: consisting of degenerate matter (a star ing two or more states or subdivisions (~ energy level) conductor: having a sufficient concentration of impurities electricity 5: having more than one codon representing acid; also: being such a codon *syn* see VICIOUS — de-gen-er-ate-ness n
de-gen-er-ate ('di-jen-(ə-)rāt) n (1545) 1: to pass from a lower type or condition: DETERIORATE 2: to sink into a dual or moral state 3: to decline in quality (his poet degenerated into jingles) 4: to decline from a condition standards of a species, race, or breed 5: to evolve or d less autonomous or less functionally active form (dege dependent parasites) (the digestive system degenerated cause to degenerate)
de-gen-er-ate ('di-jen-(ə-)rāt) n (1555) 1: one that is dege e: one degraded from the normal moral standard b, a s e: one showing signs of reversion to an earlier culture stag
de-gen-er-a-tion ('di-jen-(ə-)rā-shən, -dē-) n (15c) 1: dege 2: a lowering of effective power, vitality, or essent an enfeebled and worsened kind or state 3: intellect decline, 4 a: progressive deterioration of physical char level representing the norm of earlier generations or form oration of a tissue or an organ in which its function is dim structure, is impaired 5: marked decline in excellence manship or originality) *syn* see DETEIORATION

fleawort \ˈflə-wɔrt, -wɔ(ə)rɪ\ n (ME *flewort*, fr. OE *fleawyr*, fr. *flea* + *wyr* herb, root — more at **ROOT**) (bef. 12c): any of three Old World plants (esp. *Plantago psyllium*) whose seeds are sometimes used as a mild laxative — compare **PSYLLIUM SEED**

fleche \ˈflɛʃ, ˈflɛʃ\ n [F. lit., arrow] (1848): SPIRE esp: a slender spire above the intersection of the nave and transepts of a church

flechette \flɛˈʃet, flɛ- n [F. fr. dim. of *fleche* arrow, fr. OF *fleche*, of Gmc origin; akin to MD *flecke* arrow, OE *fleogan* to fly] (1915): a small dart-shaped projectile that is clustered in an explosive warhead, dropped as a missile from an airplane, or fired from a hand-held gun

fleck \ˈflɛk\ v [back-formation fr. *flecked* spotted, fr. ME, prob. fr. ON *flekkōtr*, fr. *flekk* spot — more at **FLAY**] (14c): STREAK SPOT (white-caps ~ed the blue sea)

fleck n (1598) 1: SPOT, MARK (a brown tweed with ~s of yellow) 2: FLAKE PARTICLE (~s of snow drifted down)

flection var of **FLexion**

fledge \ˈflɛdʒ\ v b fledged; fledging [fledge (capable of flying), fr. ME *fledge*, fr. OE *flyge*; akin to OHG *flucht* capable of flying, OE *fleogan* to fly — more at **FLY**] vi of a bird (1566): to acquire the feathers necessary for flight ~ vt 1: to rear until ready for flight or independent activity 2: to cover with or as if with feathers or down 3: to furnish (as an arrow) with feathers

fledgling \ˈflɛdʒ-lɪŋ\ n (1830) 1: a young bird just fledged 2: an immature or inexperienced person 3: one that is new (a ~ company in the industry)

flee \ˈfliː\ v b fled \ˈflɛd\; fleeing [ME *flee*, fr. OE *fleā*; akin to OHG *flihan* to flee] vi (bef. 12c) 1: a: to run away often from danger or evil: FLY b: to hurry toward a place of security 2: to pass away swiftly: VANISH (mists ~ing before the rising sun) ~ vt: to run away from: SHUN

fleece \ˈfliːs\ n [ME *fleece*, fr. OE *fleo*; akin to MHG *vlus* fleece, L *pluma* leather, down] (bef. 12c) 1: a: the coat of wool covering a wool-bearing animal (as a sheep) b: the wool obtained from a sheep at one shearing 2: a: any of various soft or woolly coverings b: a soft bulky deep-piled knitted or woven fabric used chiefly for clothing

fleece vi fleeced; fleecing (1537) 1: a: to strip of money or property by fraud or extortion b: to charge excessively for goods or services 2: to remove the fleece from: SHEAR 3: to dot or cover with fleecy masses

fleeced \ˈflɛst\ adj (1580) 1: covered with or as if with a fleece 2: of a textile: having a soft nap

fleece \ˈflɛʃ\ v b [ME (Sc) *fleechen* dial (14c): COAX, WHEEDLE

fleecey \ˈfliː-siː\ adj fleecier, -est (1590): covered with, made of, or resembling fleece (a ~ winter coat)

fleece \ˈfliːs(ə)r\ n [ME *fleyen*, of Scand origin; akin to Norw *flire* to giggle — more at **FLIMFLAM**] (15c): to laugh or grimace in a coarse derisive manner: SNEER SYN see **SCOFF** — fleecingly \-ɪŋ-lee\ adv

fleece n (1604): a word or look of derision or mockery

fleet \ˈfliːt\ v b [ME *fleten*, fr. OE *fleotan*; akin to OHG *fliozan* to float, OE *fliowan* to flow] vi (bef. 12c) 1: obs: DRIFT 2: a: to move b: to fade away: VANISH 3: to fly swiftly ~ vt 1: to cause (time) to pass usu. quickly or imperceptibly 2: [alter. of *fliit*]: to move or change in position (~ a hawser)

fleet n [ME *flete*, fr. OE *fleot* ship, fr. *fleotan*] (13c) 1: a number of warships under a single command; specif: an organization of ships and aircraft under the command of a flag officer 2: a group (as of ships, planes, or trucks) operated under unified control

fleet adj [prob. fr. *fleet*] (1529) 1: swift in motion: NIMBLE 2: EVANESCENT, FLEETING SYN see **FAST** — fleetly adv — fleetness n

fleet n (1946): an admiral of the highest rank in the navy whose insignia is five stars

fleet-footed \ˈflɛt-əd\ adj (1743): able to run fast

fleetingly \ˈflɛt-ɪŋ-lee\ adv (1563): passing swiftly: TRANSITORY SYN see **TRANSIENT**

fleet \ˈflɛt\ n [Fleet Street, London, England, center of the London newspaper district] (1882): the London press

fleisch \ˈfliːʃ\ n [Yiddish, fr. MHG *vleisch* meaty, fr. *vleisch* flesh, meat, fr. OHG *fleisk*] (1943): made of, prepared with, or used for meat or meat products — compare **MILCHIG**, **PARVE**

Fleming \ˈflɛm-ɪŋ\ n [ME, fr. MD *Vlaming* (akin to MD *Vlander* Flanders)] (12c): a member of the Germanic people inhabiting northern Belgium and a small section of northern France

Flemish \ˈflɛm-ɪʃ\ adj (14c): of, relating to, or characteristic of Flanders or the Flemings or their language

Flemish n (1727) 1: the Dutch language used by the Flemings 2 pl in constr: **FLEMINGS**

Flemish giant n (ca. 1898): a rabbit of a breed prob. of Belgian origin that is characterized by large size, vigor, and solid coat color in black, white, or gray

fleuse \ˈfliːs\ n [D *flensen* or Dan & Norw *flense*] (1814): to strip (as a whale) of blubber or skin

flesh \ˈflɛʃ\ n [ME, fr. OE *flesc*; akin to OHG *fleisk* flesh and prob. to ON *fla* to flay — more at **FLAY**] (bef. 12c) 1: a: the soft parts of the body of an animal and esp. of a vertebrate; esp: the parts composed chiefly of skeletal muscle as distinguished from visceral structures, bone, and integuments b: sleek well-fatted condition of body c: SKIN 2: a: edible parts of an animal b: flesh of a mammal or fowl that is an article of diet (abstain from ~ during religious fasts) 3: a: the physical being of man (the spirit indeed is willing, but the ~ is weak — Mt 26:41 (AV)) b: HUMAN NATURE 4: a: human beings b: MANKIND c: living beings c: STOCK, KINDRED 5: a fleshy plant part used as food; also: the fleshy part of a fruit 6: Christian Science: an illusion that matter has sensation 7: SUBSTANCE (insights buried in the ~ of the narrative — Jan Carew) — in the flesh: in person and alive

flesh vi (1530) 1: to initiate or habituate esp. by giving a foretaste 2, archaic: GRATIFY 3: to clothe or cover with or as if with flesh; broadly: to give substance to — usu. used with out 4: to free from flesh ~ vt: to become fleshy — often used with up or out

flesh and blood n (bef. 12c) 1: corporeal nature as composed of flesh and of blood 2: near kindred — used chiefly in the phrase *one's own flesh and blood* 3: SUBSTANCE, REALITY

fleshed \ˈflɛʃt\ adj (15c): having flesh esp. of a specified kind — often used in combination (pink-fleshed) (thick-fleshed)

flesh fly n (14c): a two-winged fly whose maggots feed on flesh; esp: any of a family (Sarcophagidae) of flies some of which cause myiasis

flesh-iness \ˈflɛʃ-ə-nəs\ n (15c): the state of being fleshy: CORPULENCE

fleshings \ˈflɛʃ-ɪŋz\ n pl (1838): material removed in fleshing a hide or skin

fleshy \ˈflɛʃ-i\ adj (bef. 12c) 1: a: CORPOREAL, BODILY b: of, relating to, or characterized by indulgence of bodily appetites; esp: LASCIVIOUS (~ desires) c: not spiritual: WORLDLY 2: FLESHY, PLUMP 3: having a sensuous quality (~ art) SYN see **CARNAL**

flesh-ment \ˈflɛʃ-mənt\ n [flesh] obs (1605): excitement associated with a successful beginning

flesh-pot \ˈflɛʃ-pɒt\ n (1592) 1 pl: bodily comfort: LUXURY 2: a place of lascivious entertainment — usu. used in pl.

flesh wound n (1674): an injury involving penetration of the body musculature without damage to bones or internal organs

fleshy \ˈflɛʃ-i\ adj fleshier, -est (14c) 1: a: marked by, consisting of, or resembling flesh b: marked by abundant flesh; esp: CORPULENT 2: a: SUCCULENT, PULPY (the rich ~ texture of a perfectly ripe melon) b: not thin, dry, or membranous (~ fungi)

fleshy fruit n (1929): a fruit (as a berry, drupe, or pome) consisting largely of soft succulent tissue

fletcher \ˈflɛʃ\ v [back-formation fr. *fletcher*] (1635): FEATHER (~ an arrow)

fletcher \ˈflɛʃ-ər\ n [ME *flecher*, fr. OF *flecher*, fr. *fleche* arrow — more at **FLÉCHETTE**] (14c): a maker of arrows

fleur de coin \ˈflɔːr-ə-ˈkɔɪn\ adj [F *à fleur de coin*, lit., with the bloom of the die] (ca. 1889): being in the preserved mint condition

fleur-de-lis or **fleur-de-lys** \ˈflɔːr-ˈliːz\ n, pl *fleurs-de-lis* or *fleur-de-lis* (14c): a stylized lily flower

fleur-de-lis n, pl *fleurs-de-lis* or *fleur-de-lis* (14c): a conventionalized lily in artistic design and heraldry

fleur-de-lis \ˈflɔːr-ˈliːz\ adj [alter. of ME *flor*, fr. OF *flor*, fr. *flor* flower — more at **FLOWER**] (15c): having the ends of the arms broadening out into the heads, of *fleurs-de-lis* — see **CROSS** illustration

flew past of **FLY**

flews \ˈflɪz\ n pl [origin unknown] (1575): the pendulous lateral parts of a dog's upper lip — see **DOG** illustration

flex \ˈfleks\ v b [L *flexus*, pp. of *flectere*] vi (1521) 1: to bend esp. repeatedly 2: to move muscles so as to cause flexion of (a joint) b: to move or tense (a muscle or muscles) by contraction ~ vt: BEND — flex

flex n [short for *flexible cord*] chiefly Brit (1905): electric cord

flex n (ca. 1934): an act or instance of flexing

flex-ible \ˈfleks-ə-bəl\ adj (15c): 1: capable of being flexed: PLIANT 2: yielding to influence: FLEXIBLE 3: characterized by a ready capability to adapt to new, different, or changing requirements (a ~ foreign policy) (~ public transportation) (a ~ schedule) SYN see **ELASTIC**

flex-ibil-ity \ˈfleks-ə-bəl-ə-ti\ n — flex-i-bly \ˈfleks-ə-bli\ adv

flex-ion \ˈfleks-ən\ n [L *flexion*, *flexio*, fr. *flexus*, pp. of *flectere*] (1656) 1: the act of flexing or bending 2: a part bent: BEND 3: INFLECTION 4: a: a bending movement around a joint in a limb (as the knee or elbow) that decreases the angle between the bones of the limb at the joint — compare **EXTENSION** 3b b: a forward raising of the arm or leg by a movement at the shoulder or hip joint

flex-o-graphy \ˈfleks-ə-grə-fi\ n [flexible + -o- + -graphy] (1954): a process of rotary letterpress printing using flexible plates and fast-drying inks — flexo-graph-ic \ˈfleks-ə-grəf-ik\ adj — flexo-graph-ical-ly \-ɪ-k(ə)-li\ adv

flex-or \ˈfleks-ər, -s(ə)r\ n (1615): a muscle serving to bend a body part (as a limb)

flex-time \ˈfleks-tīm\ n (1973): a system that allows employees to choose their own times for starting and finishing work within a broad range of available hours

flex-u-ous \ˈfleksh-(ə)-wəs\ adj [L *flexuosus*, fr. *flexus* bend, fr. *flexus*, pp.] (1605) 1: having turns or windings 2: lacking rigidity in structure or action (its ~ and elastic body)

flex-u-al \ˈfleksh-(ə)-rəl\ adj (1879) 1: of, relating to, or resulting from flexure 2: characterized by flexure

flex-ure \ˈfleks-shər\ n (1592) 1: the quality or state of being flexed 2: FLEXION 2: TURN, BEND, FOLD

fley \ˈfliː\ v [ME *flayen*, fr. OE *afleagan*, fr. *af*, perfective prefix + *-flegan* to put to flight] Scot (bef. 12c): FRIGHTEN

flib-ber-ti-gib-bet \ˈflɪb-ər-ti-ˈɡɪb-ət\ n [ME *flepergeber*] (15c): a silly flighty person — flib-ber-ti-gib-bety \-ət-ē\ adj

flic \ˈflik\ n [F] (1899): a French policeman

flick \ˈflik\ n [imit.] (15c) 1: a light sharp jerky stroke or movement 2: a sound produced by a flick 3: FLICKER

flick vi (1816) 1: a: to strike lightly with a quick sharp motion (~ed her horse with a whip) b: to remove with light blows (~ed an ash off her sleeve) 2: a: to move or propel with or as if with a flick (~ed her hair back over her shoulder) (~ a switch) (~ing cigarette butts into the gutter) b: to activate, deactivate, or change by or as if by flicking a switch (~ on a cigarette lighter) (~ off the radio) ~ vt 1: to go on or pass quickly or abruptly (a bird ~ed by) (~ing through some papers) 2: to direct flicks at something

flick n [short for *flicker*] (1926): MOVIE

flick-er \ˈflik-ər\ v b flickered; flickering \-(ə)-rɪŋ\ [ME *flickeren*, fr. OE *flicorian*] vi (bef. 12c) 1: to move irregularly or unsteadily: FLUTTER 2: to burn or shine fitfully or with a fluctuating light 3: to appear briefly ~ vt 1: to cause to flicker 2: to produce by flickering — flick-er-ing-ly \-(ə)-rɪŋ-lee\ adv

flicker n (1809): a common large brightly marked woodpecker (*Colaptes auratus*) of eastern N. America; also: any of several related birds of the southern and western U.S.



fleur-de-lis 2

non-hospitalized
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non-measurable

rim vb rimmed; rim-ming v (1794) 1: to serve as a rim for: BORDER
(cliffs rimming the camp) 2: to run around the rim of (putts that ~
the cup) ~ vi: to form or show a rim

ring-er \ring-ər/ n (15c) 1: one that sounds esp. by ringing 2 a: (1)
: one that enters a competition under false representations (2): IM-

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semi-nary \sem-ə-nē-ē\ *n.* pl. **-nar-ies** [ME. seedbed, nursery, seminary, fr. L. *seminarium*, fr. *semin*, *semen* seed] (15c) 1: an environment in which something originates and from which it is propagated (a ~ of vice and crime) 2: a: an institution of secondary or higher education; esp.: an academy for girls b: an institution for the training of candidates for the priesthood, ministry, or rabbinate

semi-nat-ural \sem-i-nach-(ə)-rəl, sem-i-ə\ *adj.* (ca. 1962): modified by human influence but retaining many natural features (~ temperate meadows)

semi-nifer-ous \sem-ə-nif-(ə)-rəs\ *adj.* [L. *semin*, *semen* seed + E. *-iferous*] (1692): producing or bearing seed or semen

seminaliferous tubule *n.* (1860): any of the coiled threadlike tubules that make up the bulk of the testis and are lined with a germinal epithelium from which the spermatozoa are produced

Semi-nole \sem-ə-nōl\ *n.* pl. **Seminoles** or **Seminole** [Creek *simalo-ni*, *simanó-li*, lit., wild, fr. AmerSp *cimarrón*] (1789): a member of an American Indian people of Florida

semi-no-mad \sem-i-nō-mad, sem-i-ə\ *n.* (ca. 1934): a member of a people living usu. in portable or temporary dwellings and practicing seasonal migration but having a base camp at which some crops are cultivated — **semi-no-mad-ic** \nō-mad-ik\ *adj.*

semi-nude \n(y)ūd\ *adj.* (1849): partially nude — **semi-nu-dity** \n(y)ūd-ə-tē\ *n.*

semi-offi-cial \sem-ē-ō-fish-əl, sem-i-ə\ *adj.* (1806): having some official authority or standing — **semi-offi-cial-ly** \fish-(ə)-lē\ *adv.*

semi-of-o-gy \sē-mē-ōl-ə-jē, sem-ē-, sē-mi-ə\ *n.* [Gk *semeion* sign] (ca. 1890): the study of signs; esp.: **SEMIOTIC** — **semi-of-log-i-cal** \sē-mi-ə-lāj-i-kəl\ *adj.* — **semi-of-log-i-cal-ly** \ə-lāj-i-k(ə)-lē\ *adv.* — **semi-of-o-gist** \ēl-ə-jōst\ *n.*

semi-opaque \sem-ē-ō-pāk, sem-i-ə\ *adj.* (1691): nearly opaque

semi-o-sis \sē-mē-ō-sis, sem-ē-, sē-mi-ə\ *n.* [NL, fr. Gk *semeiosis* observation of signs, fr. *semeion* to observe signs, fr. *semeion* (ca. 1907): a process in which something functions as a sign to an organism

semi-of-i-c \āt-ik\ or **semi-of-i-cs** \iks\ *n.* pl. **semiotics** [Gk *semeiotikos* observant of signs, fr. *semeiousthai* to interpret signs, fr. *semeion* sign; akin to Gk *seme* sign — more at **SEMANTIC**] (1938): a general philosophical theory of signs and symbols that deals esp. with their function in both artificially constructed and natural languages and comprises syntactics, semantics, and pragmatics — **semi-ot-ic** \āt-ik\ *adj.* — **semi-of-i-cian** \ē-fish-ən\ *n.* — **semi-of-i-cist** \āt-ə-sist\ *n.*

semi-pal-mat-ed \sem-i-pal-māt-ed, sem-i-ə\ *adj.* (1785): having the anterior toes joined only part way down with a web (a plover with ~ feet)

semi-par-a-sit-ic \par-ə-sit-ik\ *adj.* (1878): of, relating to, or being a parasitic plant that contains some chlorophyll and is capable of photosynthesis

semi-per-ma-nent \p(ə)-m-(ə)-nənt\ *adj.* (ca. 1890): lasting or intended to last for a long time but not permanent

semi-per-me-able \par-mē-ə-bəl\ *adj.* (1888): partially but not freely or wholly permeable; *specif.*: permeable to some usu. small molecules but not to other usu. larger particles (a ~ membrane) — **semi-per-me-abil-ity** \par-mē-ə-bil-ə-tē\ *n.*

semi-po-lit-i-cal \p(ə)-lit-i-kəl\ *adj.* (1857): of, relating to, or involving some political features or activity

semi-pop-u-lar \p(ə)-p(ə)-l(ə)-r\ *adj.* (1899): somewhat popular

semi-por-ce-lain \p(ə)-s(ə)-lən, -p(ə)-r\ *n.* (1880): any of several ceramic wares resembling or imitative of porcelain; esp.: a relatively high-fired and hard-glazed white earthenware widely used for tableware

semi-por-no-graph-ic \p(ə)-n(ə)-gräf-ik\ *adj.* (1964): somewhat pornographic — **semi-por-no-graph-ic-ly** \p(ə)-n(ə)-gräf-ik-lē\ *adv.*

semi-post-al \sem-i-p(ə)-s(ə)-l\, sem-i-ə\ *n.* (1927): a postage stamp sold at a premium over its postal value esp. for a humanitarian purpose

semi-pre-cious \presh-əs\ *adj.* of a gemstone (ca. 1890): of less commercial value than a precious stone

semi-pri-vate \p(ə)-vī-ət\ *adj.* (ca. 1925): of, receiving, or associated with hospital service giving a patient more privileges than a ward patient but fewer than a private patient

semi-pro \sem-i-prō, sem-i-ə\ *adj.* or *n.* (1908): **SEMI-PROFESSIONAL**

semi-pro-fes-sion-al \sem-i-prə-fesh-nəl, -ən-l\, sem-i-ə\ *adj.* (1897) 1: engaging in an activity for pay or gain but not as a full-time occupation 2: engaged in by semiprofessional players (~ baseball) — **semi-pro-fes-sion-al-ly** \ē\ *adv.*

semiprofessional *n.* (ca. 1897): one who engages in an activity (as a sport) semiprofessionally

semi-public \sem-i-p(ə)-blik, sem-i-ə\ *adj.* (1804) 1: open to some persons outside the regular constituency 2: having some features of a public institution; *specif.*: maintained as a public service by a private nonprofit organization

semi-quant-i-ta-tive \kwān(t)-ə-tāt-iv\ *adj.* (ca. 1927): constituting or involving less than quantitative precision — **semi-quant-i-ta-tive-ly** *adv.*

semi-qua-ver \sem-i-kwā-vor, sem-i-ə\ *n.* (1576): **SIXTEENTH NOTE**

semi-re-lig-i-ous \ri-j-i-əs\ *adj.* (1864): somewhat religious in character

semi-re-tired \ri-t(ə)-rēd\ *adj.* (1937): working only part-time esp. because of age or ill health

semi-re-tire-ment \ri-t(ə)-rēm-ənt\ *n.* (1923): the state or condition of being semiretired

semi-rigid \sem-i-rī-jid, sem-i-ə\ *adj.* (1908) 1: rigid to some degree or in some parts 2: of an airship: having a flexible cylindrical gas container with an attached stiffening keel that carries the load

semi-rur-al \rūr-əl\ *adj.* (ca. 1864): somewhat rural

semi-sa-cred \sā-kred\ *adj.* (ca. 1898): **SEMI-RELIGIOUS**

semi-se-cret \sē-kret\ *adj.* (1917): not publicly announced but widely known nevertheless

semi-sed-en-tary \sed-n-ter-ē\ *adj.* (ca. 1930): sedentary during part of the year and nomadic otherwise (~ tribes)

semi-shrub-by \sem-i-shrub-ē, sem-i-ə\, esp. Southern **-srob-ē** *adj.* (1930): resembling or being a shrub

semi-skilled \sem-i-skild, sem-i-ə\ *adj.* (1916): having or requiring less training than skilled labor and more than unskilled labor

semi-soft \s(ə)-ft\ *adj.* (ca. 1903): moderately soft; *specif.*: firm but easily cut (~ cheese)

semi-solid \sāl-əd\ *adj.* (1834): having the qualities of both a solid and a liquid: highly viscous — **semi-solid** *n.*

semi-sweet \swēt\ *adj.* (1943): slightly sweetened (~ chocolate)

semi-syn-thet-ic \sin-thet-ik\ *adj.* (1937) 1: produced by chemical alteration of a natural starting material (~ penicillin) 2: containing both chemically identified and complex natural ingredients (a ~ diet)

Sem-ite \sem-īt, esp. Brit. \sē-mīt\ *n.* [F. *semit*, fr. *Sem* Shem, fr. LL *Sem*, fr. Heb *Shēm*] (1875): a member of any of a group of people of southwestern Asia chiefly represented now by the Jews and Arabs but in ancient times also by the Babylonians, Assyrians, Aramaeans, Canaanites, and Phoenicians

semi-ter-res-trial \sem-i-t(ə)-res-trē-əl, sem-i-ə\, **-res(h)-chəl** *adj.* (1917) 1: growing on boggy ground 2: frequenting but not living wholly on land

'Semitic \sə-mit-ik\ *adj.* [G. *semitisch*, fr. *Semit*, *Semite* Semite, prob. fr. NL *Semita*, fr. LL *Sem Shem*] (1826) 1: of, relating to, or characteristic of the Semites; *specif.*: **SEMITIC** 2: of, relating to, or constituting a subfamily of the Afro-Asiatic language family that includes Hebrew, Aramaic, Arabic, and Ethiopic

'Semitic *n.* (1875): any or all of the Semitic languages

Semitic-ist \sə-mit-ə-sist\ *n.* (1956): **SEMITIST**

Semit-ics \mit-iks\ *n.* pl. but *sing* in constr. (1895): the study of the language, literature, and history of Semitic peoples; *specif.*: **Semitic philology**

Semit-ism \sem-ə-tiz-əm\ *n.* (1851) 1: a: Semitic character or qualities b: a characteristic feature of a Semitic language occurring in another language 2: policy favorable to Jews: predisposition in favor of Jews

Semit-ist \st-əst\ *n.* (1885) 1: a scholar of the Semitic languages, cultures, or histories 2: often not cap.: a person favoring or disposed to favor the Jews

semi-ton-al \sem-i-tōn-l\, **semi-t(ə)-n(ə)-l** *adj.* (1863): **CHROMATIC** 3a, **SEMITONIC** — **semi-ton-al-ly** \l-ē\ *adv.*

semi-tone \sem-i-tōn, sem-i-ə\ *n.* (1609): the tone at a half step; also: **HALF STEP** — **semi-ton-ic** \sem-i-tān-ik, sem-i-ə\ *adj.* — **semi-ton-i-cal-ly** \i-k(ə)-lē\ *adv.*

semi-trail-er \sem-i-trā-lor, sem-i-ə\ *n.* (1919) 1: a freight trailer that when attached is supported at its forward end by the fifth wheel device of the truck tractor 2: a trucking rig made up of a tractor and a semi-trailer

semi-trans-lu-cent \sem-i-tran(t)s-lūs-nt, sem-i-ə\, **-tran-z** *adj.* (1832): somewhat translucent

semi-trans-pa-ent \tran(t)s-par-ənt, -p(ə)-r\ *adj.* (1793): imperfectly transparent

semi-trop-i-cal \trāp-i-kəl\ also **semi-trop-ic** \ik\ *adj.* (1860): **SUBTROPICAL**

semi-trop-ics \iks\ *n.* pl. (1908): **SUBTROPICS**

semi-vow-el \sem-i-vau-(ə)-l\ *n.* (1530) 1: one of the glides (as English *y*, *w*, or *r*) 2: a letter representing a semivowel

'semi-week-ly \sem-i-wē-klē, sem-i-ə\ *adj.* (1791): occurring twice a week — **semiweekly** *adv.*

'semiweekly *n.* (1833): a semiweekly publication

'semi-works \sem-i-works, sem-i-ə\ *n.* pl. often attrib. (1926): a manufacturing plant operating on a limited commercial scale to provide final tests of a new product or process

semi-year-ly \sem-i-yi(ə)-lē, sem-i-ə\ *adj.* (1928): occurring twice a year

se-mo-li-na \sem-ə-lē-nə\ *n.* [It. *semolino*, dim. of *semola* bran, fr. L. *simila* finest wheat flour] (1797): the purified middlings of hard wheat (as durum) used esp. for pasta (as macaroni or spaghetti)

sem-per-vi-vum \sem-p(ə)-vī-vəm\ *n.* [NL, fr. L. neuter of *sempervivus* ever-living, fr. *semper* ever + *vivus* living — more at **QUICK**] (ca. 1591): any of a large genus (*Sempervivum*) of Old World fleshy herbs of the orpine family often grown as ornamentals

semi-pli-ter-nal \sem-pli-t(ə)-rən-l\ *adj.* [ME, fr. LL *sempiternalis*, fr. L. *sempiternus*, fr. *semper* ever, always, fr. *semi* one, same (akin to ON *samr* same) + *per* through — more at **SAME FOR**] (15c): of never-ending duration: **ETERNAL** — **semi-pli-ter-nal-ly** \l-ē\ *adv.*

semi-pli-ter-ni-ty \t(ə)-rən-l-ē-tē\ *n.* (1599): **ETERNITY**

semi-ple \sem-p(ə)-l\ *adj.* [alter. of *simple*] Scot. (1759): of humble birth

semi-ple \sem-pli-čə\ *adj.* or *adv.* [It, fr. L. *simplic*, *simplex* — more at **SIMPLE**] (ca. 1740): **SIMPLE** — used as a direction in music

semi-prē \sem-(p)prā\ *adv.* [It, fr. L. *semper*] (ca. 1801): **ALWAYS** — used in music directions (~ *legato*)

semp-stress \sem(p)-stres\ var. of **SEAMSTRESS**

'sen \sen\ *n.* pl. **sen** [Jp.] (1727) — see **yen** at **MONEY** table

'sen *n.* pl. **sen** [Indonesian *sén*, prob. fr. E. cent] (1951) — see **rupiah** at **MONEY** table

'sen *n.* pl. **sen** [prob. fr. Indonesian *sén*] (1954) — see **dollar**, **riel** at **MONEY** table

'sen *n.* pl. **sen** [Malay, prob. fr. E. cent] (1967) — see **ringgit** at **MONEY** table

se-nar-i-us \si-nar-ē-əs, -ner-ē\ *n.* pl. **se-nar-ii** \ē-lī, -ē-ē\ [L, fr. *senarius* consisting of six each, fr. *seni* six each, fr. *sex* six — more at **SIX**] (1540): a verse consisting of six feet esp. in Latin prosody

se-na-ry \sen-ə-rē, sēn-ē\ *adj.* [L. *senarius* consisting of six] (1661): of, based on, or characterized by six: compounded of six things or six parts (~ scale) (~ division)

sen-ate \sen-ət\ *n.* [ME *senat*, fr. OF, fr. L. *senatus*, lit., council of elders, fr. *sen*, *senex* old, old man — more at **SENIOR**] (13c) 1: an assembly or council usu. possessing high deliberative and legislative functions; as a: the supreme council of the ancient Roman republic and empire b: the second chamber in the bicameral legislature of a major political unit (as a nation, state, or province) 2: the hall or chamber in which a senate meets 3: a governing body of some universities charged with maintaining academic standards and regulations and usu. composed of the principal or representative members of the faculty

sen-a-tor \sen-ət-ər, as a title also **sen-tor** \n\ [ME *senatour*, fr. OF *senateur*, fr. L. *senator*, fr. *senatus*] (13c): a member of a senate

sen-a-tor-i-al \sen-ət-ər-ē-əl, -t(ə)-r-ē-əl\ *adj.* (1740): of, relating to, or befitting a senator or a senate (~ office, ~ rank)

senatorial courtesy *n.* (1884): a custom of the U.S. Senate of refusing to confirm a presidential appointment of an official in or from a state when the appointment is opposed by the senators or senior senator of the president's party from that state

senatorial district *n.* (1829): a territorial division from which a senator is elected — compare **CONGRESSIONAL DISTRICT**

1/6

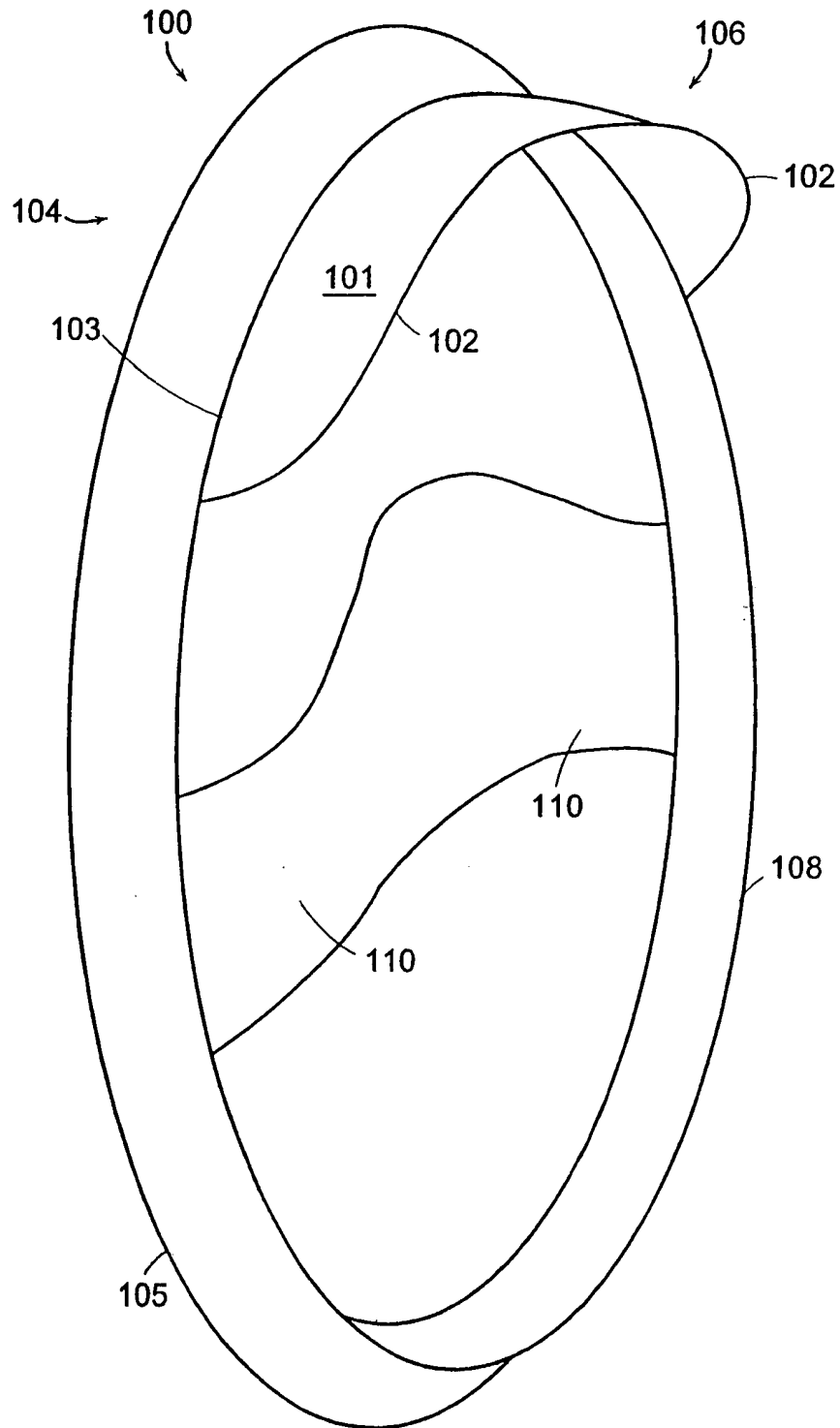


FIG. 1

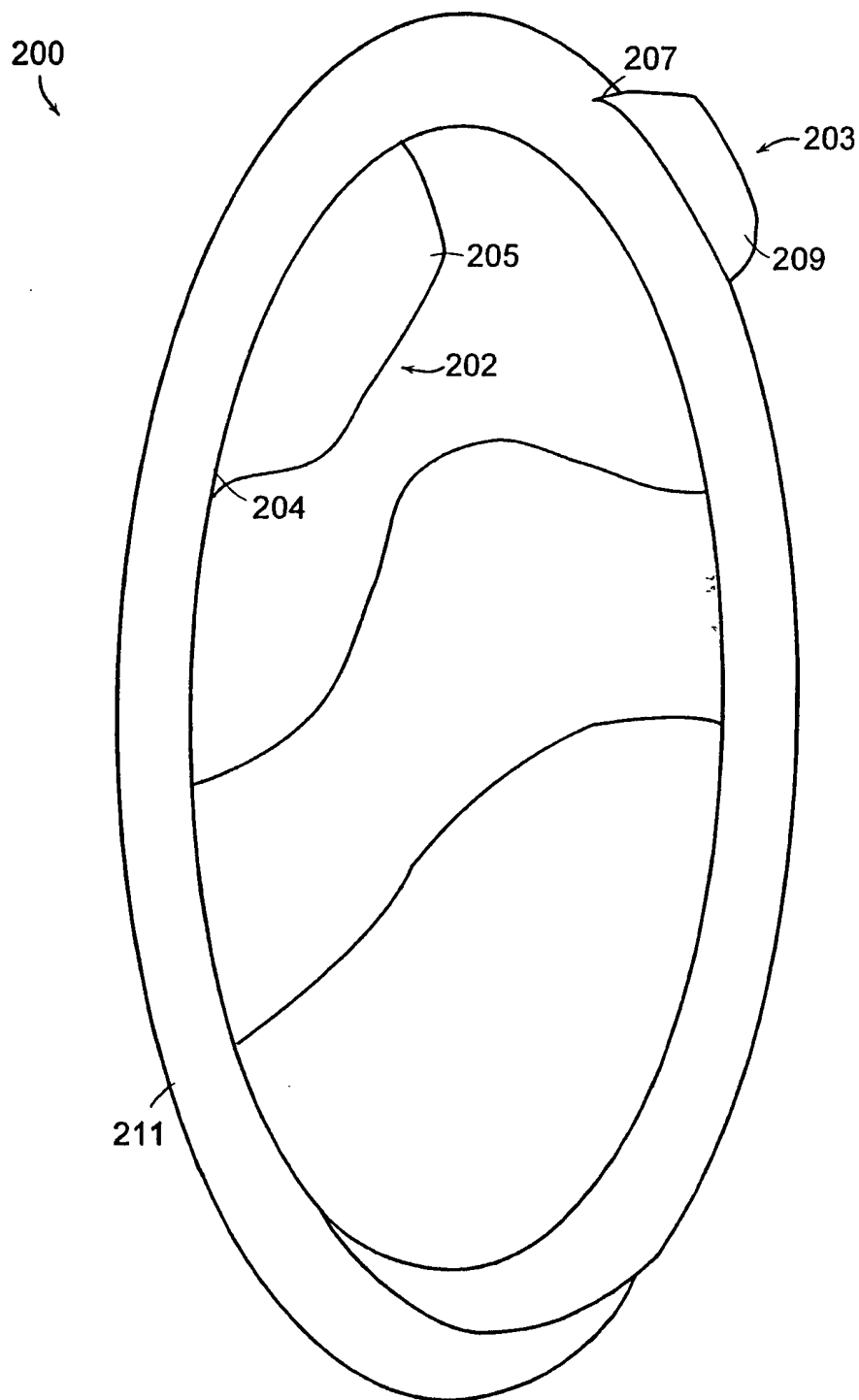


FIG. 2

3/6

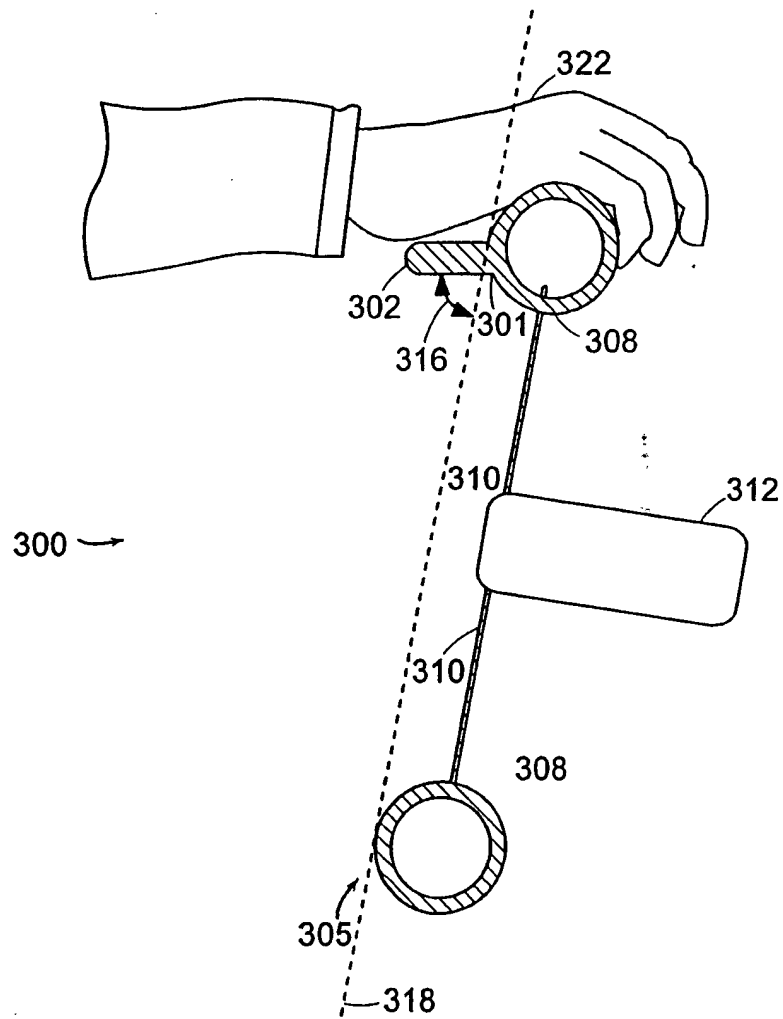


FIG. 3

4/6

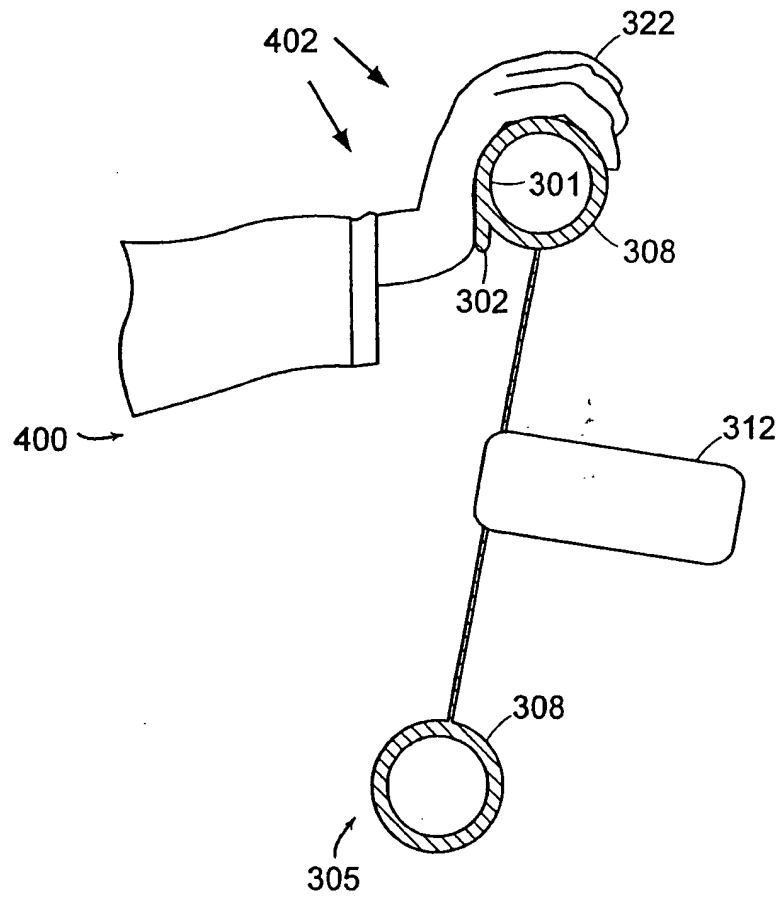


FIG. 4

5/6

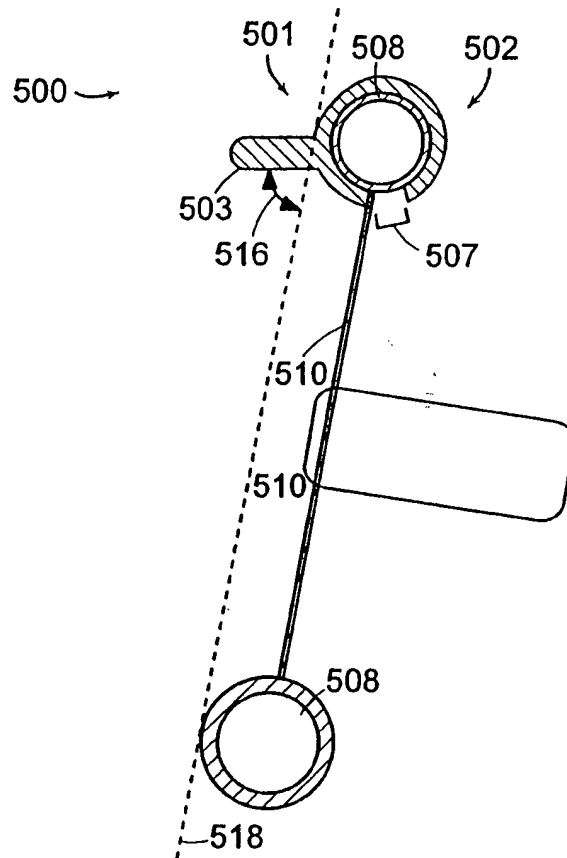


FIG. 5

6/6

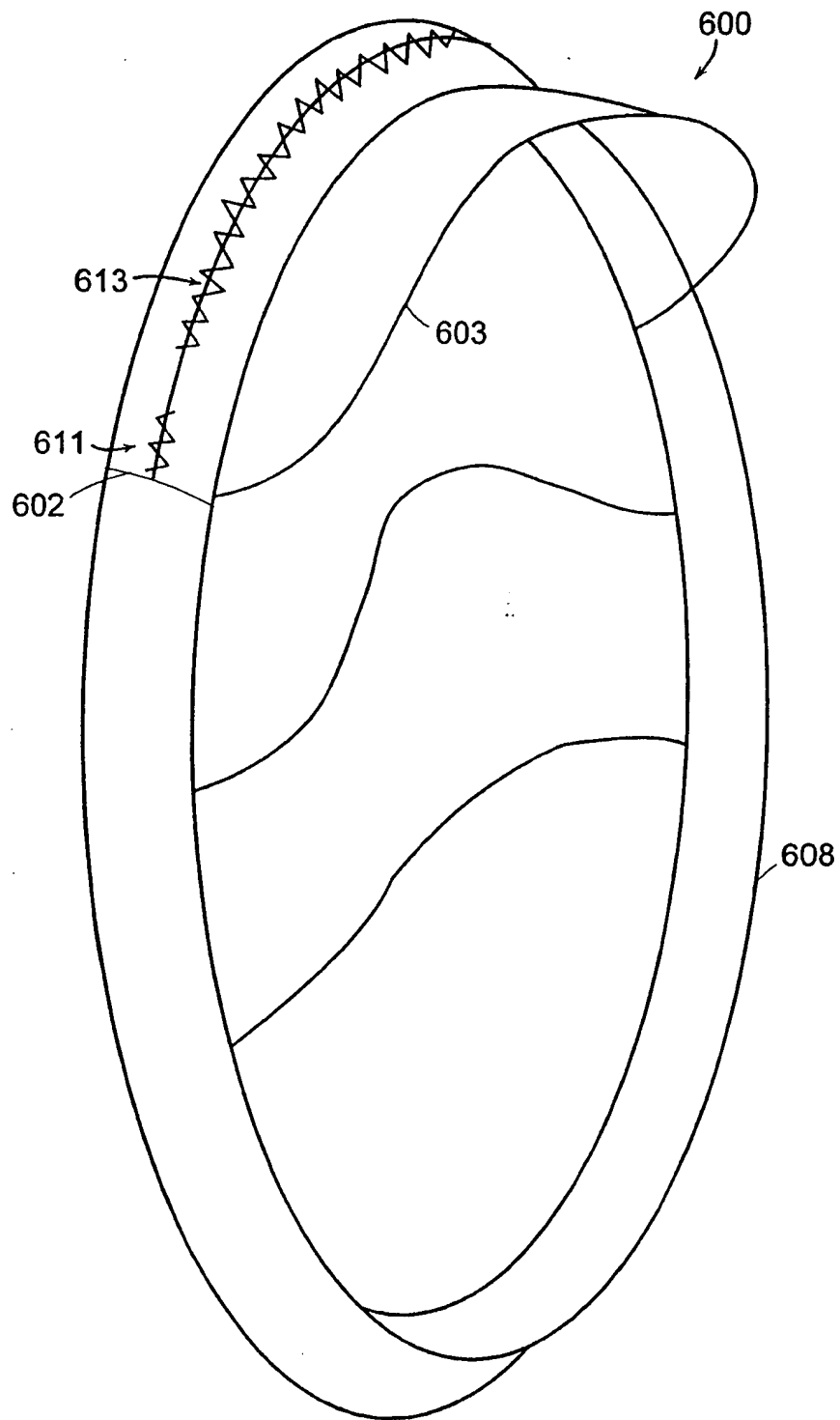


FIG. 6



UNITED STATES PATENT AND TRADEMARK OFFICE

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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/727,306	12/03/2003	Douglas B. Wilson	114089.120	5202
23483	7590	07/14/2006	EXAMINER	
WILMER CUTLER PICKERING HALE AND DORR LLP			LUONG, VINH	
60 STATE STREET			ART UNIT	
BOSTON, MA 02109			PAPER NUMBER	
			3682	

DATE MAILED: 07/14/2006

Please find below and/or attached an Office communication concerning this application or proceeding.



WILMER CUTLER PICKERING
HALE and DORR LLP DOCKETING
RE: 114089.120/641
Action Date: _____
Action to be Taken: _____
Docketed By: BUB On: 7-8-06

**Advisory Action
Before the Filing of an Appeal Brief**

Application No.

10/727,306

Applicant(s)

WILSON, DOUGLAS B.

Examiner

Vinh T. Luong

Art Unit

3682

--The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

THE REPLY FILED 26 June 2006 FAILS TO PLACE THIS APPLICATION IN CONDITION FOR ALLOWANCE.

1. ☒ The reply was filed after a final rejection, but prior to or on the same day as filing a Notice of Appeal. To avoid abandonment of this application, applicant must timely file one of the following replies: (1) an amendment, affidavit, or other evidence, which places the application in condition for allowance; (2) a Notice of Appeal (with appeal fee) in compliance with 37 CFR 41.31; or (3) a Request for Continued Examination (RCE) in compliance with 37 CFR 1.114. The reply must be filed within one of the following time periods:

- a) ☒ The period for reply expires 3 months from the mailing date of the final rejection.
b) ☐ The period for reply expires on: (1) the mailing date of this Advisory Action, or (2) the date set forth in the final rejection, whichever is later. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of the final rejection.

Examiner Note: If box 1 is checked, check either box (a) or (b). ONLY CHECK BOX (b) WHEN THE FIRST REPLY WAS FILED WITHIN TWO MONTHS OF THE FINAL REJECTION. See MPEP 706.07(f).

Extensions of time may be obtained under 37 CFR 1.136(a). The date on which the petition under 37 CFR 1.136(a) and the appropriate extension fee have been filed is the date for purposes of determining the period of extension and the corresponding amount of the fee. The appropriate extension fee under 37 CFR 1.17(a) is calculated from: (1) the expiration date of the shortened statutory period for reply originally set in the final Office action; or (2) as set forth in (b) above, if checked. Any reply received by the Office later than three months after the mailing date of the final rejection, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

NOTICE OF APPEAL

2. ☐ The Notice of Appeal was filed on _____. A brief in compliance with 37 CFR 41.37 must be filed within two months of the date of filing the Notice of Appeal (37 CFR 41.37(a)), or any extension thereof (37 CFR 41.37(e)), to avoid dismissal of the appeal. Since a Notice of Appeal has been filed, any reply must be filed within the time period set forth in 37 CFR 41.37(a).

AMENDMENTS

3. ☐ The proposed amendment(s) filed after a final rejection, but prior to the date of filing a brief, will not be entered because
(a) ☐ They raise new issues that would require further consideration and/or search (see NOTE below);
(b) ☐ They raise the issue of new matter (see NOTE below);
(c) ☐ They are not deemed to place the application in better form for appeal by materially reducing or simplifying the issues for appeal; and/or
(d) ☐ They present additional claims without canceling a corresponding number of finally rejected claims.

NOTE: _____. (See 37 CFR 1.116 and 41.33(a)).


4. ☒ The amendments are not in compliance with 37 CFR 1.121. See attached Notice of Non-Compliant Amendment (PTOL-324).
5. ☐ Applicant's reply has overcome the following rejection(s): _____.
6. ☐ Newly proposed or amended claim(s) _____ would be allowable if submitted in a separate, timely filed amendment canceling the non-allowable claim(s).
7. ☒ For purposes of appeal, the proposed amendment(s): a) ☐ will not be entered, or b) ☒ will be entered and an explanation of how the new or amended claims would be rejected is provided below or appended.
The status of the claim(s) is (or will be) as follows:
Claim(s) allowed: _____.
Claim(s) objected to: _____.
Claim(s) rejected: 14-19, 24/14, 27.
Claim(s) withdrawn from consideration: 20-23, 14/20, 25, 26, 28.

AFFIDAVIT OR OTHER EVIDENCE

8. ☐ The affidavit or other evidence filed after a final action, but before or on the date of filing a Notice of Appeal will not be entered because applicant failed to provide a showing of good and sufficient reasons why the affidavit or other evidence is necessary and was not earlier presented. See 37 CFR 1.116(e).
9. ☐ The affidavit or other evidence filed after the date of filing a Notice of Appeal, but prior to the date of filing a brief, will not be entered because the affidavit or other evidence failed to overcome all rejections under appeal and/or appellant fails to provide a showing of good and sufficient reasons why it is necessary and was not earlier presented. See 37 CFR 41.33(d)(1).
10. ☐ The affidavit or other evidence is entered. An explanation of the status of the claims after entry is below or attached.

REQUEST FOR RECONSIDERATION/OTHER

11. ☒ The request for reconsideration has been considered but does NOT place the application in condition for allowance because:
See Continuation Sheet.
12. ☐ Note the attached Information Disclosure Statement(s). (PTO/SB/08 or PTO-1449) Paper No(s). _____.
13. ☒ Other: See Continuation Sheet.


Vinh T. Luong
Primary Examiner

Continuation of 11.

See the reasons set forth in the final Office action on March 30, 2006. In addition, regarding Applicant's reliance on extrinsic evidence, e.g., Webster's Dictionary, the Examiner respectfully submits that the specification is the single best guide to the meaning of a claim term. *Phillips v. AWH Corp.*, 75 USPQ2d 1321 (Fed. Cir. 2005)(en banc). Moreover, Applicant's arguments are similar to the arguments presented in copending Application No. 10720821, the Examiner's response in the final rejection on May 9, 2006 of Appl.'821 is incorporated herein by reference.

Continuation of 13. Other:

The replacement drawings filed on June 26, 2006 are accepted by the Examiner.



Vinh T. Luong
Primary Examiner

**Notice of Non-Compliant
Amendment (37 CFR 1.121)**

Application No.

10/727,306

Examiner

Vinh T. Luong

Applicant(s)

WILSON, DOUGLAS B.

Art Unit

3682

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

The amendment document filed on 26 June 2006 is considered non-compliant because it has failed to meet the requirements of 37 CFR 1.121 or 1.4. In order for the amendment document to be compliant, correction of the following item(s) is required.

THE FOLLOWING MARKED (X) ITEM(S) CAUSE THE AMENDMENT DOCUMENT TO BE NON-COMPLIANT:

- ☐ 1. Amendments to the specification:
- ☐ A. Amended paragraph(s) do not include markings.
 - ☐ B. New paragraph(s) should not be underlined.
 - ☐ C. Other _____.
- ☐ 2. Abstract:
- ☐ A. Not presented on a separate sheet. 37 CFR 1.72.
 - ☐ B. Other _____.
- ☐ 3. Amendments to the drawings:
- ☐ A. The drawings are not properly identified in the top margin as "Replacement Sheet," "New Sheet," or "Annotated Sheet" as required by 37 CFR 1.121(d).
 - ☐ B. The practice of submitting proposed drawing correction has been eliminated. Replacement drawings showing amended figures, without markings, in compliance with 37 CFR 1.84 are required.
 - ☐ C. Other _____.
- ☒ 4. Amendments to the claims:
- ☐ A. A complete listing of all of the claims is not present.
 - ☐ B. The listing of claims does not include the text of all pending claims (including withdrawn claims)
 - ☒ C. Each claim has not been provided with the proper status identifier, and as such, the individual status of each claim cannot be identified. Note: the status of every claim must be indicated after its claim number by using one of the following status identifiers: (Original), (Currently amended), (Canceled), (Previously presented), (New), (Not entered), (Withdrawn) and (Withdrawn-currently amended).
 - ☐ D. The claims of this amendment paper have not been presented in ascending numerical order.
 - ☒ E. Other: See Continuation Sheet.
- ☐ 5. Other (e.g., the amendment is unsigned or not signed in accordance with 37 CFR 1.4):

For further explanation of the amendment format required by 37 CFR 1.121, see MPEP § 714.

TIME PERIODS FOR FILING A REPLY TO THIS NOTICE:

1. Applicant is given **no new time period** if the non-compliant amendment is an after-final amendment or an amendment filed after allowance. If applicant wishes to resubmit the non-compliant after-final amendment with corrections, the **entire corrected amendment** must be resubmitted.
2. Applicant is given **one month**, or thirty (30) days, whichever is longer, from the mail date of this notice to supply the correction, if the non-compliant amendment is one of the following: a preliminary amendment, a non-final amendment (including a submission for a request for continued examination (RCE) under 37 CFR 1.114), a supplemental amendment filed within a suspension period under 37 CFR 1.103(a) or (c), and an amendment filed in response to a *Quayle* action. If any of above boxes 1. to 4. are checked, the correction required is only the **corrected section** of the non-compliant amendment in compliance with 37 CFR 1.121.

Extensions of time are available under 37 CFR 1.136(a) only if the non-compliant amendment is a non-final amendment or an amendment filed in response to a *Quayle* action.

Failure to timely respond to this notice will result in:

Abandonment of the application if the non-compliant amendment is a non-final amendment or an amendment filed in response to a *Quayle* action; or

Non-entry of the amendment if the non-compliant amendment is a preliminary amendment or supplemental amendment.

Vinh T. Luong

Primary Examiner

Legal Instruments Examiner (LIE), if applicable

Telephone No.

Continuation of 4(e) Other: Each claim has not been provided with the proper status identifier. For example, claims 20-23 are withdrawn, however, Applicant identified these claims as "Previously Added."

A handwritten signature in black ink, appearing to read 'Vinh T. Luong', followed by a long horizontal line extending to the right.

Vinh T. Luong
Primary Examiner

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of: Wilson

Examiner: Vinh Luong

Serial No.: 10/727,306

Art Unit: 3682

Filing Date: December 3, 2003

Attorney Docket No.: 114089-120

For: **FATIGUE RELIEVING SUPPORT FOR STEERING WHEELS AND
THE LIKE**

I hereby certify that this paper (along with any paper referred to as being attached or enclosed) is being deposited with the U.S. Postal Service on the date shown below with sufficient postage as First Class Mail, in an envelope addressed to: Mail Stop AF, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

Dated: 7/31/06

Signature: 
(Jody Begley)

Mail Stop AF
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

**AMENDMENT AND RESPONSE
TO NOTICE OF NON-COMPLIANT AMENDMENT**

Sir:

Applicants submit the following timely response to the Notice of Non-Compliant Amendment mailed July 14, 2006. Please amend the application as provided below.

This Response places the application and the claims therein, in condition for allowance.

In this Response, the amendments to the specification begin on page 2.

The amendments to the claims begin on page 5.

The Remarks begin on page 8.

Specification:

Page 2, please rewrite the third full paragraph as follows:

The system of the present invention will include at least one part that extends outward at an angle from a plane across the face of the steering wheel or vehicular control. This part is at least partially deformable in at least one direction, so that the system will not interfere with the operation of the wheel or control. This deformability, however, will not impede the support function of the system on the invention. Furthermore, the deformable material has memory, so that after a deforming force is removed, it resumes its original predeformation configuration and shape, which is extending outward at an angle from a plane across the face of the steering wheel or vehicular control.

Page 3, please rewrite the seventh full paragraph as follows:

Deformable ~~material~~ second section 102 extends outward from steering control 105 over a predetermined section of the steering control, which is shown in Figure 1 to be an arc. As is better shown in Figure 3, a deformable second section such as 102 extends outward at an angle from a plane across the face of a steering control such as 105. Deformable second section 102 may extends outward from the steering control at or below the inside circumference of the control over the predetermined arc. This arc will typically include at least the ten 104 and two 106 o'clock positions, or may include the entire circumference.

Page 4, please rewrite the fourth and fifth full paragraphs as follows:

The first system of the present invention at 202 includes first section 204 that connects to steering control 211 and second section 205 that extends outward from first section 204. Further, a second section such as 205 extends outward at an angle from a plane across the face of a steering control such as 211 (see Figure 3). First section 204 may be rigid, semi-rigid, or deformable, while second section 205 is deformable. If the first section is deformable, it may have memory.

Similarly, the second system of the present invention at 203 includes first section 207 that connects to steering control 211 and second section 209 that extends outward

from first section 207. Further, a second section such as 209 extends outward at an angle from a plane across the face of a steering control such as 211 (see Figure 3). First section 207 may be rigid, semi-rigid, or deformable, while second section 209 is deformable. Again, if the first section is deformable, it may have memory. Further, second sections 205 and 209 may be rigid, semi-rigid or flexible, or non-deformable and still be within the scope of the present invention.

Page 5, please rewrite second full paragraph as follows:

Referring to Figure 3, generally at 300, steering control 305 is shown that includes rim 308, spokes 310, and steering column 312. First section 301 is formed integral with rim 308 and deformable second section 302 extends outward from the first section. As is shown, second section 302 extends outward at angle 316 from plane 318 across the face of steering control 305. The material of second section 302 has sufficient strength that when driving, the driver may rest his/her wrists or portions of the hands 322 on the material and they will be supported. The structure is such that the weight of the arms and hands through the wrists or portions of the hands are supported without the material deforming.

Page 6, please rewrite the second and third full paragraphs as follows:

Referring to Figure 5, generally at 500, a second embodiment of the present invention is shown. System 501 of the present invention shown in Figure 5 includes a first section 502 that detachably connects to steering control rim. Deformable second section 503 connects to, and extends outwardly from, first section 502. As is shown, deformable second section 503 extends outward at angle 516 from plane 518 across the face of steering control rim 508. First section 502 may snap-on or otherwise attach to the steering control such that it may appear integral with the steering control. One of many possible known means for accomplishing this is by first section 502 being mostly rigid, and leaving a space 507 so the attachment can be forced over rim 508 and leave room for the steering control spokes 510. Regardless of the means for attachment, once first section 502 is attached to the steering control, it will provide all of the benefits that have been described for the first section being integrally formed with the rim. Additionally,

the second embodiment, may be a single structure with a single resting material support, a single structure with multiple resting supports, or multiple structures each with its own resting support. As in the other embodiments, the second section may be rigid, semi-rigid or flexible, or non-deformable and still be within the scope of the present invention.

By way of example, Figure 6, generally at 600, shows another alternate method to attach the system of the present invention to steering control rim 608. The system in this figure has first section 602 that will envelop rim 608. First section 602 may be made from a flexible material. First section 602 may have a slit 611, which after this section envelops the rim, may be stitched shut by stitches 613. As in the other embodiments of the present invention, deformable second section 603 connects to, and extends outwardly from, first section 602. Further, a deformable second section such as 603 extends outward at an angle from a plane across the face of a steering control rim such as 608 (see Figures 3 and 5). Again, the second section may be rigid, semi-rigid, or non-deformable and still be within the scope of the present invention.

In the Claims

1-13. (Cancelled)

14. (Previously Presented) A fatigue relieving/preventing apparatus associated with a steering wheel for controlling a vehicle, comprising:

a first section that connects to a peripheral portion of the steering wheel; and

a rigid, semi-rigid or flexible, or non-deformable second section that connects to, and extends from the first section at the peripheral portion of the steering wheel, the second section extends from the first section outward at an angle to a plane across a front face of the steering wheel, the second section for supporting at least a portion of a vehicular operator's body when pressure from the portion of the vehicular operator's body on the second section is less than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel, and deforming out of interference with the vehicular operator's ability to operate the steering wheel when pressure from the portion of the vehicular operator's body on the second section is equal to or greater than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel.

15. (Currently Amended) The apparatus as recited in claim 14, wherein the steering wheel includes a the steering wheel for controlling at least a nautical vessel, aircraft, or ground transportation vehicle.

16. (Previously Presented) The apparatus as recited in claim 14, wherein the portion of the body supported by the second section includes at least a forearm, wrist, or hand.

17. (Currently Amended) The apparatus as recited in claim 14, wherein the first section extends a predetermined length of a ~~predetermined~~ the peripheral portion of the steering wheel.

18. (Previously Presented) The apparatus as recited in claim 14, wherein the second section includes at least two second sections that each connect to the first section at separate locations.

19. (Previously Presented) The apparatus as recited in claim 17 or 18, wherein the first section is deformable.

20. (Withdrawn) A fatigue relieving/preventing apparatus associated with a steering wheel for controlling a vehicle, comprising:

at least two discrete first sections that each connect to a peripheral portion of the steering wheel, and

a discrete rigid, semi-rigid or flexible, or non-deformable second section that connects to, and extends from each first section at a peripheral portion of the steering wheel, each second section extends from the first section outward at an angle to a plane across a front face of the steering wheel, each second section for supporting at least a portion of a vehicular operator's body when pressure from the portion of the vehicular operator's body on the second section is less than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel, and deforming out of interference with the vehicular operator's ability to operator the steering wheel when pressure form the portion of the vehicular operator's body on the second section is equal to or greater than the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel..

21. (Withdrawn) The apparatus as recited in claim 20, wherein the steering wheel includes a steering wheel for controlling at least a nautical vessel, aircraft or ground transportation vehicle.

22. (Withdrawn) The apparatus as recited in claim 20, wherein the portion of the body supported by the second section includes at least a forearm, wrist, or hand.

23. (Withdrawn) The apparatus as recited in claim 20, wherein the apparatus is adjustable for supporting different sizes or types of body portions.

24. (Currently Amended) The apparatus as recited in claim 14 ~~or 20~~, wherein each first section is formed integral with the steering wheel.

25. (Withdrawn) The apparatus as recited in claim 14 or 20, wherein each first section is detachable from the steering wheel.

26. (Withdrawn) The apparatus as recited in claim 20, wherein each first section is deformable.

27. (Previously Presented) The apparatus as recited in claim 14, wherein the first section is flexible, rigid, or semi-rigid, or non-deformable.

28. (Withdrawn) The apparatus as recited in claim 20, wherein the first section is flexible, rigid, or semi-rigid, or non-deformable.

Remarks

I. Introduction

This Amendment supersedes the amendment mailed June 26, 2006, and is responsive to the notice of non-compliant amendment.

Claims 14-19, 24/14, and 27 are pending in the present application. The Examiner has recited several grounds for objecting to and rejecting the present application. Examiner objected to the drawings for not including representations to the angular disposition of second section of the fatigue/relieving apparatus. In view of this objection to the drawings, the Examiner objected to the specification. The Examiner also has objected to claims 14-19, 24/14, and 27 for indefiniteness under 35 U.S.C. 112, second paragraph. Lastly, the Examiner rejected pending claims 14-19, 24/14 and 27 under 35 U.S.C. 102(b) for anticipation based on either Van Arsdell, U.S. Patent No. 2,118,540; Anson, U.S. Patent No. 2,134,020; or Laubach, U.S. Patent No. 1,575,848. Applicant will demonstrate herein that the objections and rejections have been overcome by this Response, thereby placing the present application in condition for allowance.

II. The Corrected Drawings Overcome the Examiner's Objection

On page 3 of the Office Action, the Examiner objected to the drawings because "each part of the invention, e.g., the angle and the face in claim 14 should be designated by a reference numeral or character." Applicant has corrected the drawings as requested by the Examiner (Attachment B). Applicant respectfully submits six (6) Replacement Sheets of drawings. These changes to the drawings do not add new matter. As such, Applicant has traversed the Examiner's basis for objection to the drawings.

III. The Specification, As Amended, Overcome the Examiner's Objection

On page 4 of the Office Action, the Examiner objected to the specification for "failing to provide proper antecedent basis for the claimed the subject matter, such as, 'an angle,' in claim 14." Applicant has amended the specification to overcome this objection.

These amendments do not add new matter. Therefore, this objection should be withdrawn.

IV. The Claims, As Amended Are Definitive.

On page 3 of the Office Action, the Examiner contends that the terms “rigid,” “semi-rigid,” “flexible,” or “non-deformable” in claims 14 and 17 are indefinite. Applicant submits that these terms would be understood by a person of ordinary skill in the art in light of the present invention.

The Examiner contends that 14 and 17 are indefinite under 35 U.S.C. §§ 112, second paragraph, because of the recitation of the terms “rigid,” “semi-rigid,” “flexible,” and “non-deformable.” In particular, the Examiner asserts that these terms are indefinite because these terms “[are] not defined by the claim, the specification does not provide a standard for the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention.” Further, the Examiner contends that “it is unclear what range of Rockwell hardness of the material of the second section is required in order to be considered as terms “rigid,” semi-rigid, or flexible, or non-deformable.” Applicant submits that the claims are definite as will be shown.

Claims 14 and 17, include the terms “rigid,” “semi-rigid,” “flexible,” and “non-deformable.” Applicant has attached as Attachment A excerpts from the Ninth New Collegiate Dictionary. These excerpts demonstrate that each of the terms that the Examiner has contended is indefinite is a very common term that a person of ordinary skill in the art would understand with sufficiency to make and use the present invention. The attached excerpts make plain that a person of ordinary skill in the art would clearly understand the scope of the claims when “rigid,” “semi-rigid,” or “flexible,” or “non-deformable,” is used. As such, claims 14 and 17 would be definite in the hands of a person of ordinary skill in the art. Noting this, Applicant overcomes the Examiner’s indefiniteness rejection under 35 U.S.C. § 112, second paragraph, as to the use of the terms “rigid,” “semi-rigid,” “flexible,” and “non-deformable,” and respectfully requests that this rejection be withdrawn with regard to claims 14 and 19.

The Examiner also rejected claims 15 and 17 for allegedly having no anticipated basis for the terms “a steering wheel” and “a peripheral portion of the steering wheel,”

respectively. Applicant has amended the claims to remove any possible confusion on the part of the Examiner with regard to overcoming this obviousness rejection.

Noting the foregoing, Applicant has traversed each of the Examiner's basis for rejecting the claims for indefiniteness under 35 U.S.C. 112, second paragraph.

V. Claims 14-19 Are Not Anticipated Under 35 § U.S.C. 102(b)

Claims 14-19, 24/14 and 27 are pending in the present application. In the current Office Action, claims 14-19, 24-14 and 27 have been rejected by the Examiner for anticipation under 35 U.S.C. § 102 (b) based on a three references. These references are U.S. Patent No. 1,575,848 to Laubach ("Laubach"), U.S. Patent No. 2,118,540 to Van Arsdel ("Van Arsdel"), and U.S. Patent No. 2,134,020 to Anson ("Anson"). More specifically, the Examiner relied on Van Arsdel or Anson for rejecting claims 14-17, 19/17, 24/14 and 27; and Laubach for rejecting claims 14, 18 and 19/18. Hereinafter, Applicant will demonstrate that claims 14-19, 24/14, and 27, as presently amended, place the present application in condition for allowance and the application should be passed to issue.

A. Applicable Law

In order for there to be anticipation under 35 U.S.C. §102, a single prior art reference must show each and every feature of the claimed invention in the same way. . *Brown v. 3M*, 265 F.3d 1349, 1351 (Fed. Cir. 2001) ("To anticipate, every limitation of the claimed invention must be found in a single prior art reference, arranged as in the claim"); *Kloster Speedsteel AB v. Crucible, Inc.*, 793 F.2d 1565, 1571 (Fed. Cir. 1986) ("absence from the reference of any claimed element negates anticipation"). Applicant submits that neither Van Arsdel, Anson, nor Laubach satisfy this standard for finding anticipation under 35 U.S.C. § 102(b).

B. Van Arsdel Does Not Anticipate Claims 14-19, 24/14, and 27

Claim 14 is an independent claim and claims 15-19, 24/14, and 27 depend from claim 14. As such, claims 15-19, 24/14, and 27 add features to claim 20.

In relying on Van Arsdel, the Examiner does not cite to any descriptions of the auto steering wheel handgrip disclosed in this reference but annotates the drawings for this purpose. Specifically, the Examiner annotated Figures 3 and 5 in an attempt to show

what is being claimed in claim 14. The Examiner states that reference no. 4 equates to the first section and reference no. 2 equates to the second section of claim 14. Applicant submits that the Examiner fails to consider and appreciate all of the elements of the second section because if he did, two things would be clear (i) the grip-rest is in a plane parallel with the one across the face of the steering wheel and (ii) there is a missing element.

Van Arsdel at column 2, lines 13-54 states:

The grip-rest 2 is concave longitudinally and about half of the rest extends over and part way across the steering wheel rim 3 in a manner to slope downwardly and inwardly of the rim. The outer edge 4 on the side, and 5 of the rear end of the concave, located above the rim, extends up into a marginal flange to be contacted by the inside of the ball of the thumb or by the bottom of the hand, depending upon which part of the hand is seated on the rest. These flanges 4 and 5 enable the operator instantly to feel any deviation of the car from a straight course and gives him something substantial to push against in resistance and also in rotating the wheel to steer the car around corners and curves and away from obstructions or bad places in the roadway.

The rotation of the steering wheel by hand pressure against the flanges 4 and 5 is assisted by the palm and fingers, which are wrapped around the rim of the wheel, and increase the fingerhold [on] the grip-rest 2, which is thickened and bifurcated to straddle the rim as shown in Fig. 6, is provided with recesses separated by ridges, here shown as three in number, 6, 7, and 8.... [See Figure 4]

The weight of the hand and arm are comfortably supported with the bottom of the hand resting in the concavity of the grip-rest as shown in Fig. 1, or with the ball of the thumb seated in the concavity as shown in Fig. 2....

My improved grip-rest may be formed integral with the rim of the steering wheel as shown in Fig. 8, but I prefer to make it removable as an attachment for any make of car and also to make it adjustable to suit the requirements or fancy of the driver. [Emphasis added]

A review of Figures 3 and 5, as annotated by the Examiner, attempts to show that the grip-rest of Van Arsdel is disposed outward at an angle α to a plane across the face of the steering wheel shows that the Examiner's position is misplaced. As the description above from Van Arsdel indicates, the grip-rest is disposed as shown in Figure 6 parallel to the plane across the face of the steering wheel not at angle to it. This is very clear because in each disposition of the grip-rest in the Figures, it is fixed in this parallel plane

to support the thumb or part of the palm. It is also fixed so that it is not deformable so the driver can put extensive pressure on it (and it will not move) for steering the automobile (See underscored sections in the quotation above).

If the grip-rest were supposed to be at an angle commensurate with the present invention as the Examiner contends, its disposition would be shown differently in the drawings. As such, there is not support for the Examiner's contention that the grip-rest is disposed other than in the plane parallel to the plane across the form of the steering wheel. Accordingly, one skilled in the art would not understand the grip-rest in Van Arsdel to be disposed as the Examiner contends.

There is also no support in the description of the grip-rest in Van Arsdel that it will deform in any way out of interference with the operation of the steering wheel. Applicant submits he is justified in taking this position given the description of the connection of the grip-rest as shown in Figure 6 or the integrally formed grip-rest shown in Figure 8. Therefore, the grip-rest of Van Arsdel would not anticipate the invention as set forth in claim 14 because it is missing at least one element, i.e., Van Arsdel at least does not teach or suggest the features of the second section being deformable out of interference with the operation of the steering wheel as set forth in claim 14.

Noting in the foregoing, Applicant has demonstrated that the auto steering wheel grip-rest of Van Arsdel does not anticipate (or render obvious) the invention of claim 14. Accordingly, Applicant respectfully requests that the anticipation rejection based on Van Arsdel be withdrawn.

Claims 15-17, 19/17, 24/14, and 27 depend from claim 14. As such, each of these dependent claims includes all the features of claim 14. Therefore, claims 15-17, 19/17, 24/14, and 27 are not anticipated by Van Arsdel for the same reasons that claim 14 is not anticipated by this patent. Thus, Applicant has traversed the Examiner's basis for rejecting claims 15-17, 19/17, 24/14, and 27 for anticipation and respectfully requests that this rejection be withdrawn.

C. Anson Does Not Anticipate Claims 14-17, 19/17, 24/14, and 27

The Examiner has rejected claims 14-17, 19/17, 24/14, and 27 for anticipation based on Anson. Referring to the Figures of Anson, the Examiner states that reference

no. 13 equates to the first section and reference no. 11 equates to the second section of claim 14. The Examiner has annotated Figure 8 to indicate that the steering wheel attachment of Anson is disposed at an angle α with respect to a plane across the face of the steering wheel. Before addressing the Examiner's basis of rejection, Applicant submits that the description of the steering wheel attachment of Anson is germane to the Examiner's position on anticipation. Applicant also submits that if this description is taken into consideration, the Examiner should withdraw the anticipation rejection based on Anson.

In the description of the purpose of the steering wheel attachment in Anson, the patent states (Page 1, left column, lines 6-25):

I have found that in the driving of an automobile and particular when driving for extended periods of time over long distances, the normal manner of holding and manipulating the steering wheel, wherein both driver's hands grasp the wheel in positions which require the driver's arms to remain in a raised and more or less unnatural and uncomfortable position, considerable strain develops in the driver's hands, arms, shoulders and back particularly, and results in excess of fatigue, such as will frequently dull the driver's normal reflexes and alertness and thereby increase the danger of accidents.

To obviate these disadvantages, I have devised an attachment for steering wheels, which permits a driver to assume a completely comfortable and relaxed driving position, while at the same time, affords a means permitting the driver to at all times retain positive operating control of the steering wheel. [Emphasis added]

The steering wheel attachment of Anson is subsequently described in the patent. The following description is stated (Page 1, right column, line 49 – Page 2, left column, line 18):

The attachment comprises a hand grip portion 11, which is preferably of bulbular form.... Grip portion 11 normally extends downward from the wheel rim and is of suitable length to adapt same to extend to the region of the driver's lap so that it may be grasped by the driver's hand when his hand is resting in a normal comparable position in his lap. Grip portion 11...which will have sufficient pliability...to be deflected from its normal pendant position without adversely affecting the measure of control of the steering wheel movements afforded by the positive operating movement of the attachment, while at the same time, neck 12 will retain sufficient rigidity to permit operating movements of hand grip 11 to be positively

communicated to the steering wheel rim for effective control of its movements. [Emphasis added]

Applicant submits that the steering wheel attachment of Anson does disclose all of the elements of claim 14. As set forth in the quotation above, the steering wheel attachment of Anson is a pliable structure that dangles downward from the bottom of the steering wheel. It is further understood from the quotation above that in use the steering wheel attachment is grasped by the driver's hand while the arms and hands are resting in the driver's lap. There is no teaching in Anson that the steering wheel attachment can be disposed of any location other than at the bottom of the steering wheel where it dangles for use. The other dispose of the hand grip at the top of rim is for situations where it is removed from use.

The Examiner has cited Anson at Page 2, Left Column, Lines 62-72, as teaching the deformability element of the second section in claim 14. As the quotation above demonstrates, when the Anson handgrip is in use, it is in the pendent position and used to steer the vehicle. If, during normal operations, the driver were to grab the steering wheel in an emergency situation, he would release the handgrip and grab the wheel, for example, at the 10 and 2 o'clock positions. In doing so, the pendent-hanging handgrip would not be deformed as set forth in claim 14 because it would not be in use. Moreover, if it were used, it would not be deformed out of interference but would be held to steer the vehicle.

The Examiner has stated the handgrip of Anson equates to deformation according to claim 14 because it may be moved from the bottom pendent position to the top of the steering wheel. When the handgrip is moved to the top, it is moved there to be purposefully out of use all the time so it will not be in a position to be deformed as set forth in the second section of claim 14.¹ In order to move the handgrip, it would be understood that the vehicle would have to be stopped, the handgrip detached and repositioned at the top, and reattached.

Given the foregoing, the steering wheel attachment of Anson at least does not indicate the element of the second section being disposed outward at an angle from the plane across the face of the steering wheel (Anson extends rearward) and it does not

¹ Anson, page 2, left column, lines 68-72.

teach that the attachment will be deformable out of interference with the operation of the steering wheel as set forth in claim 14.

Applicant has demonstrated that claim 14 is not anticipated (or rendered obvious) by Anson and requests that the anticipation rejection based on this patent be withdrawn.

Claims 15-17, 19/17, 24/14, and 27 depend from claim 14. As such, each of these dependent claims includes all the features of claim 14. Therefore, claims 15-17, 19/17, 24/14, and 27 are not anticipated by Anson for the same reasons that claim 14 is not anticipated by this patent. Applicant has traversed the Examiner's basis for rejecting claims 15-17, 19/17, 24/14, and 27 for anticipation and respectfully requests that this rejection be withdrawn.

D. Laubach Does Not Anticipate Claims 14, 18, and 19/18

The Examiner has rejected claims 14, 18, and 19/18 for anticipation based on Laubach. In formulating the rejection based on Laubach, the Examiner has not relied on any part of the disclosure in that patent but has annotated the drawings to allegedly show that Laubach teaches each and every feature of claim 14. The Examiner states that reference nos. 7 and 8 of the knob 2 equates to the first section and reference no. 10 equates to the second section of claim 14. Applicant submits that the Examiner's reliance on Laubach is misplaced.

Laubach states the following with regard to the knobs attached to the steering wheel (Page 1, line 43 – 71):

By particularly considering the Figures 2 and 3, it will be seen that the knobs 2 are secured to the rim of the wheel 1 by means of securing screws 4, these screws being threaded as indicated at 5 longitudinally through the knobs 2, and extending for quite a distance through the entire length of the knobs, thereby efficiently bracing the same. The inner ends of the knobs 2 are concave as indicated at 6, so as to conform to the contour of the outer periphery of the wheel 1....

Each knob 2 is provided with a plurality of finger sockets 9 upon the upper face thereof, and an enlarged head portion 10 at the outer end thereof, for the purpose of facilitating the gripping of the knob and preventing the actual slippage of the hand of the operator from the knob 2. [Emphasis added]

The Examiner has annotated the drawings to attempt to show that enlarged head 10 is disposed outward at an angle from the plane across the face of the steering wheel. This is not supported.

The hands of the driver are supported by gripping the knobs in the defined finger recesses shown in the drawings. The heads 10 are enlarged for this sole purpose of preventing the hands from slipping off of the knobs. The heads 10 clearly are not disposed at an angle outward of the plane across the face of the steering wheel but are placed at the end of the knobs solely to act as a stop. Further, the heads 10 are not deformable out of interference with the operation of the steering wheel as set forth in claim 14. They are fixed in place along with the rest of the knobs.

The description of the knobs and a review of the Figures makes plain that the knobs are not deformable and they are not disposed at an angle with respect to the a plane across the face of the steering wheel. The knobs are rigidly connected to the steering wheel by screws 5. Any movement of them requires removing the screws, drilling the wheel at a new location, and reattaching the knobs at the new location. At this new location, the knobs will in a plane parallel to the plane across the face of the steering wheel.

The knobs do not deform out of interference with the operation of the steering wheel as in the second section of claim 14. In fact, once the Laubach knobs are secured by screws 5 as shown and described, they are fixed and not movable during normal operations. If they are not unscrewed, the only movement would be to apply a destructive force to the knobs, thereby breaking them.

Therefore, Laubach at least does not teach the features of the second section being disposed outward at an angle from the plane across the face of the steering wheel and the knobs of Laubach do not deform out of interference with the operation of the steering wheel as set forth in claim 14.

Applicant has demonstrated that claim 14 is not anticipated (or rendered obvious) by Laubach and requests that the anticipation rejection based on this patent be withdrawn.

Claims 18 and 19/18 depend from claim 14. As such, each of these dependent claims includes all the features of claim 14. Therefore, claims 18 and 19/18 are not anticipated by Laubach for the same reasons that claim 14 is not anticipated by this

patent. Therefore, Applicant has traversed the Examiner's bases for rejecting claims 18 and 19/18 for anticipation and respectfully requests that this rejection be withdrawn.

Please charge any fees which may be due, or credit any overpayments, to our Deposit Account No. 08-0219.

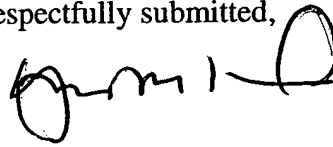
III. Conclusion

In this Response, Applicant has traversed Examiner's (i) objection to the drawings, (ii) objection to the specification, (iii) and anticipation rejections under 35 U.S.C. 102(b) based on either Van Arsdel, U.S. Patent No. 2,118,540; Anson, U.S. Patent No. 2,134,020; and Laubach, U.S. Patent No. 1,575,848. As such, Applicant has placed the present application in condition for allowance.

The present invention is new, non-obvious and useful. Reconsideration and allowance of the claims are respectfully requested.

Dated: 7/31/06

Respectfully submitted,



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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/720,821	11/24/2003	Douglas B. Wilson	114089.120	5355
23483	7590	05/09/2006	EXAMINER LUONG, VINH	
WILMER CUTLER PICKERING HALE AND DORR LLP 60 STATE STREET BOSTON, MA 02109			ART UNIT 3682	PAPER NUMBER

DATE MAILED: 05/09/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

*WILMER CUTLER PICKERING
HALE and DORR LLP DOCKETING*
RE: 114089.120 US 2
Action Date: 8/9/06
Action to be Taken: Final Office Action
Docketed By: ryi On: 5/11/06



Office Action Summary

Application No.

10/720,821

Applicant(s)

WILSON, DOUGLAS B.

Examiner

Vinh T. Luong

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3682

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 25 April 2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 20-28 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 20-28 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

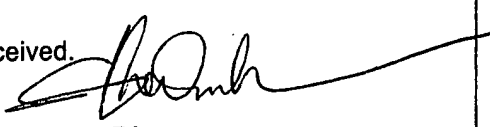
Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 25 April 2006 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.


Vinh T. Luong
Primary Examiner

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☒ Other: Attachments 1-3.

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1. The Amendment filed on April 5, 2006 has been entered.
2. The replacement drawings were received on April 25, 2006. These drawings are accepted by the Examiner.
3. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
4. Claims 20-26 and 28/20 are rejected under 35 U.S.C. 102(b) as being anticipated by Van Arsdel (US Patent No. 2,118,540).

Regarding claim 20, Van Arsdel teaches a fatigue relieving/preventing apparatus associated with a steering wheel 3 for controlling a vehicle comprising:

a first section 4 (i.e., horizontal section in Fig. 3) that connects to a peripheral portion 3 of the steering wheel 3; and

a second section 2 (i.e., a concave upward section in Figs. 3 and 5) that connects to and extends from the first section 4 at the peripheral portion 3 of the steering wheel 3, the second section 2 extends from the first section 4 outward at an angle (see angle α in Figs. 3 and 5 of the Attachment 1) to a plane (Att. 1) across a face to the steering wheel 3, with the second section 2 inherently for supporting at least a portion of a vehicular operator's body (e.g., the hand as seen in Figs. 1 and 2) when pressure from the portion of the vehicular operator's body on the second section 2 is less than the pressure for deforming the second section 2 out of interference with the vehicular operator's ability to operate the steering wheel 3, and deforming out of interference with the vehicular operator's ability to operate the steering wheel when pressure from the portion of the vehicular operator's body on the second section is equal to or greater than

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the pressure for deforming the second section out of interference with the vehicular operator's ability to operate the steering wheel 3. *Ibid.* right column on page 1, lines 29-54.

Regarding claim 21, the second section 2 is inherently deformable in at least one direction when deforming pressure is applied to such second section 2. Note that virtually anything will be deformed if enough pressure is applied to it. See the term "flexible" in *Fredman v. Harris-Hub Co., Inc.*, 163 USPQ 397 (DC 1969).

Regarding claim 22, the second section 2 supports a portion of the vehicular operator's body when pressure from such body portion is applied in at least one direction.

Regarding claim 23, the steering wheel includes a steering wheel for controlling at least a nautical vessel, an aircraft, or a ground transportation vehicle.

Regarding claim 24, the second section 2 will inherently return to an original first position after deforming pressure is removed therefrom.

Regarding claim 25, the portion of the body supported by the second section includes at least a forearm, wrist, or hand.

Regarding claim 26, the first section 4 extends a length of a predetermined peripheral portion of the steering wheel 3.

Regarding claim 28/20, the first section 4 is inherently deformable. See the term "flexible" in *Fredman v. Harris-Hub Co., Inc., supra.*

5. Claims 20-26 and 28/20 are rejected under 35 U.S.C. 102(b) as being anticipated by Anson (US Patent No. 2,134,020).

Regarding claim 20, Anson teaches a fatigue relieving/preventing apparatus associated with a steering wheel 10 for controlling a vehicle comprising:

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a first section 13 that connects to a peripheral portion of the steering wheel 10;

a second section 11 extends from the first section at the peripheral portion of the steering wheel 10, the second section 11 extends from the first section 13 outward at an angle (see angle α in Fig. 8 of Attachment 2) to a plane (Att. 2) across a face (Att. 2) to the steering wheel 3, the second section 11 inherently for supporting at least a portion of a vehicular operator's body (e.g., the hand) when pressure from the portion of the vehicular operator's body on the second section 11 is less than the pressure for deforming the second section 11 out of interference with the vehicular operator's ability to operate the steering wheel 10, and deforming out of interference with the vehicular operator's ability to operate the steering wheel 10 when pressure from the portion of the vehicular operator's body on the second section 11 is equal to or greater than the pressure for deforming the second section 11 out of interference with the vehicular operator's ability to operate the steering wheel 10.

Regarding claim 21, the second section 11 is deformable in at least one direction when deforming pressure is applied to such second section 11 since it is made of a flexible material such as rubber. *Ibid.* right column on page 1, lines 46-53. On the other hand, note that virtually anything will be deformed if enough pressure is applied to it. See the term "flexible" in *Fredman v. Harris-Hub Co., Inc., supra*.

Regarding claim 22, the second section 11 supports a portion of the vehicular operator's body when pressure from such body portion is applied in at least one direction.

Regarding claim 23, the steering wheel 10 includes a steering wheel for controlling at least a nautical vessel, an aircraft, or a ground transportation vehicle.

Regarding claim 24, the second section 11 will return to an original first position after

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deforming pressure is removed therefrom since it is made of a flexible material such as rubber.

Ibid. right column on page 1, lines 46-53.

Regarding claim 25, the portion of the body supported by the second section includes at least a forearm, wrist, or hand.

Regarding claim 26, the first section 13 extends a length of a predetermined peripheral portion of the steering wheel 10.

Regarding claim 28/20, the first section 13 is deformable since it is made of a flexible material such as rubber. *Ibid.* left column on page 2, lines 19-34. See also the term "flexible" in *Fredman v. Harris-Hub Co., Inc., supra.*

6. Claims 20, 27, and 28/27 are rejected under 35 U.S.C. 102(b) as being anticipated by Laubach (US Patent No. 1,575,848).

Regarding claim 20, Laubach teaches a fatigue relieving/preventing apparatus associated with a steering wheel 1 for controlling a vehicle comprising:

a first section 7, 8 that connects to a peripheral portion of the steering wheel 1;

a second section 10 that connects to, and extends from, the first section 7, 8 at the peripheral portion of the steering wheel 1, the second section 10 extends from the first section 7, 8 outward at an angle (see angle α in Fig. 2 of the Attachment 3) to a plane (Att. 3) across a face (Att. 3) to the steering wheel 1, the second section 10 inherently for supporting at least a portion of a vehicular operator's body (e.g., the hand) when pressure from the portion of the vehicular operator's body on the second section 10 is less than the pressure for deforming the second section 10 out of interference with the vehicular operator's ability to operate the steering wheel 1, and deforming out of interference with the vehicular operator's ability to operate the steering

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wheel 1 when pressure from the portion of the vehicular operator's body on the second section 10 is equal to or greater than the pressure for deforming the second section 10 out of interference with the vehicular operator's ability to operate the steering wheel 1.

Regarding claim 27, the second section 10 includes at least two second sections 10 that each connects to the first section 7, 8 at separate locations (by comparing Applicant's Fig. 2 with Laubach's Fig. 1).

Regarding claims 28/20 and 28/27, the first section 10 is inherently deformable. See the term "flexible" in *Fredman v. Harris-Hub Co., Inc., supra*.

7. Applicant's arguments filed April 5, 2006 have been fully considered but they are not persuasive.

Objections to the Drawings and Specification

The objections have been withdrawn in view of Applicant's replacement drawings and amendment.

Art Rejection

Van Arsdel

Applicant contended, *inter alia*, that:

A review of Figs. 3 and 5 as announced by the Examiner to attempt to show that the auto steering wheel handgrip of Van Arsdel is disposed at an angle α to a plane across the face of the steering wheel shows that the Examiner's position is misplaced. As the description above from Van Arsdel indicates, *the auto steering wheel handgrip is disposed as shown in Figure 6 parallel to the plane across the face of the steering wheel not at angle to it*. This is very clear because in each disposition of the auto steering wheel handgrip in the Figures, the handgrip is fixed in this parallel plane to support the thumb or part of the palm. *It is also fixed so that it is not deformable so the driver can put extensive pressure on*

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it (and it will not move) for steering the automobile (see underscored sections in the quotation above). (Emphasis added).

The Examiner respectfully submits:

As noted in MPEP 2111, during patent examination, *claims are given their broadest reasonable interpretation consistent with the specification*. It is proper to use the specification to interpret what the applicant meant by a word or phrase recited in the claim. However, *it is not proper to read limitations appearing in the specification into the claim when these limitations are not recited in the claim*. See *In re Paulsen*, 30 F.3d 1475, 1480, 31 USPQ2d 1671, 1674 (Fed. Cir. 1994); and *Intervet America Inc. v. Kee-Vet Lab. Inc.*, 887 F.2d 1050, 1053, 12 USPQ2d 1474, 1476 (Fed. Cir. 1989). (Emphasis added).

At the outset, Applicant's arguments are not based on the limitations appearing in the claims. *In re Self*, 213 USPQ 1, 5 (CCPA 1982). In fact, Applicant's claim 1 recites "*a second section that connects to, and extends from, the first section outward at an angle to a plane across a face to the steering wheel.*" It is clear from claim 1 that it requires the second section of the handgrip, *not the handgrip per se*, extends from the first section outward at an angle to the plane across the face of the steering wheel. Therefore, Applicant's contention that "[a]s the description above from Van Arsdel indicates, *the auto steering wheel handgrip is disposed as shown in Figure 6 parallel to the plane across the face of the steering wheel not at angle to it*" is immaterial to the patentability of the claim. The issue is not whether Arsdel's handgrip disposed at an angle relative to the plane across the face of the steering wheel. Rather, the issue is whether Arsdel teaches the second section that connects to and extends from the first section outward at an angle relative to the plane across the face of the steering wheel.

In the case at hand, on page 1, right column, lines 13-28, Arsdel describes: "[t]he grip rest 2 is *concave* longitudinally and about half of the rest extends over and part way across the

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steering wheel rim 3 in a manner to slope downwardly and inwardly of the rim. The outer edge 4 of the side, and 5 of the rear end of the *concave*, located above the rim, *extends up into a marginal flange* to be contacted by the inside of the ball of the thumb or by the bottom of the hand, depending upon which part of the hand is seated to rest.” See also Arsdel’s claims 1 and 2. Arsdel’s concave upward section 2 extends from the first section 4 outward at an angle α to the plane across the face of the steering wheel as seen in Figs. 3 and 8 of Attachment 1. Therefore, Arsdel’s concave upward section 2 in Fig. 3 of Arsdel “reads on” Applicant’s claimed second section.

In addition, Applicant’s contention that Arsdel’s handgrip “is also *fixed* so that it is not deformable so the driver can put extensive pressure on it (and *it will not move*) for steering the automobile” is unsupported by substantial evidence in the record. Indeed, on page 1, right column, line 49 through line 2, left column, page 2, Arsdel expressly describes:

My improved grip-rest may be formed integrally with the rim of the steering wheel as shown in Fig. 8, but I prefer to make it *removable* as an attachment for any make of car and also to make it *adjustable* to suit the requirements or fancy of the driver. (Emphasis added).

Particularly, Applicant’s contention is in direct conflict with Arsdel’s description on page 2, left column, lines 28-32:

The grip rest *may be shifted* along the length of the rim, or vertically around it by reversing the screw sufficiently to permit *change of the rest to the new position*, where it will be held again by tightening up on the screw. (Emphasis added).

Simply put, Arsdel explicitly teaches that the driver may loosen the screw 14 in Fig. 6 so that it is *deformable* in order that the driver can put extensive pressure on it and *it will move* for steering the automobile.

The support in the description of Arsdel that it will deform out of the interference with the operation of the steering wheel is on page 2, left column, lines 28-32. By loosening or reversing the screw 14 sufficiently to permit Arsdel's second section 2 shifted or vertically around the rim 3, the second section can be at the new position wherein the second section does not interfere with the operation of the steering wheel to suit the requirements or fancy of the driver.

For the reasons set forth above, the rejection based on Arsdel is respectfully maintained.

Anson

First, on page 10 of the Amendment, Applicant argued that the steering wheel attachment of Anson teaches away from the invention of claim 20. It is well settled that "[a]rguments that the alleged anticipatory prior art is 'nonanalogous art' or 'teaches away from the invention' or not recognized as solving the problem solved by the claimed invention, [are] not germane to a rejection under section 102." *Twin Disc, Inc. v. United States*, 231 USPQ 417, 424 (Cl. Ct. 1986) and MPEP 2131.05.

Second, Applicant asserted that there is no teaching in Anson that the steering wheel attachment can be disposed of any location other than at the bottom of the steering wheel where it dangles for use.

The instant assertion is likewise unsupported by substantial evidence in the record. For example, on page 1, left column, line 48 through line 32, right column, Anson expressly describes: "a means for attachment to the steering wheel, whereby *the device may be readily attached to, or removed from, the wheel, and which may be quickly and easily shifted to various*

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positions on the wheel as dictated by the degree of driving comfort desired." Particularly, on page 2, left column, lines 62-72, Anson teaches:

At the same time, if it becomes desirable to move the attachment to a different position on the wheel rim, a slight movement of the grip portion toward the wheel rim will loosen the contact of strap 13 therewith, and the attachment can then be easily shifted to some other position on the wheel. Similarly, *the attachment may be rotated about the wheel rim* from its normal pendent position to *a position within the periphery of the wheel* when it becomes desirable to dispense with its use in operating the wheel. (Emphasis added).

As evidenced in the above quotation, Anson explicitly states that the driver may rotate Anson's attachment/handgrip about the wheel rim 10 to a position within the periphery of the wheel, *i.e.*, to a position shown in Applicant's Fig. 4 when the driver so desires. Anson's description above shows that Anson-type-attachment is operated in a similar manner to what is claimed in claim 20. As such, a person of ordinary skill in the art would find that there is a teaching in Anson in which the hands are or other body part is supported by Anson attachment as set forth in claim 20.

Third, in the same vein of arguments, Applicant argued: "the steering wheel attachment of Anson at least does not teach the features of the second section being disposed outward at an angle from the plane across the face of the steering wheel (Anson extends rearward) and it does not teach that the attachment would deform out of interference with the operation of the steering wheel as set forth in claim 20."

However, since Anson's *attachment may be rotated about the wheel rim* from its normal pendent position to *a position within the periphery of the wheel* when it becomes desirable to dispense with its use in operating the wheel, Anson's attachment clearly is capable to be rotated

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outward such that the second section 11 is at an angle from the plane across the face of the steering wheel and out of interference with the operation of the steering wheel as claimed. On the other hand, it is well settled that a claim containing a "recitation with respect to the manner in which a claimed apparatus is intended to be employed does not differentiate the claimed apparatus from a prior art apparatus" if the prior art apparatus teaches all the structural limitations of the claim. *Ex parte Masham*, 2 USPQ2d 1647 (Bd. Pat. App. Inter. 1987) and MPEP 2114. In the case at hand, Anson teaches all structural limitations in the claims, therefore, Applicant's contention regarding the manner in which the claimed device is intended to be employed is unpersuasive.

Laubach

Applicant contended that the knobs of Laubach are rigidly connected to the steering wheel by the screws 5, thus, the knobs are meant remain in place in operation. Nevertheless, common sense teaches that the driver can unscrew Laubach's screws 5, and then screw or fasten the screws 5 at other position on the rim 6 of the steering wheel as the driver so desires. In other words, the position of Laubach's knobs is capable of being changed. As such, Laubach's knobs can inherently perform the functions recited in Applicant's claim. *In re Schreiber*, 128 F.3d 1437, 44 USPQ2d 1429 (Fed. Cir. 1997).

Applicant further asserted that the Examiner's drawings to attempt to show the enlarged head 10 is disposed outward at an angle from the plane across the face of the steering wheel is unsupported. Applicant's instant assertion is in direct conflict with the substantial evidence presented in Laubach's Fig. 2. This Fig. 2 shows that the second section of Laubach forms an angle with the face of the steering wheel as seen in Attachment 3. Note that things clearly shown

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in reference patent drawing qualify as prior art features, even though unexplained by the specification as long as they are not inconsistent with the specification. *In re Mraz*, 173 USPQ 25 (CCPA 1972).

Finally, Applicant averred that the knob of Laubach does not deform out of interference with the operation of the steering wheel as set forth in claim 20. The Examiner respectfully submits that the driver can unscrew Laubach's screws 5, and then screw or fasten the screws 5 at other position on the rim 6 of the steering wheel such that the new position is out of interference with the operation of the steering wheel as the driver so desires. The operation to adjust or change the position of Laubach's handgrips is similar to the operation to adjust the handgrip of Arsdel since both Laubach and Arsdel use the screws as the fastening means. Since the position of Laubach's knobs is capable of being changed to be out of interference with the operation of the steering wheel, *i.e.*, Laubach's knobs can inherently performed the functions recited in Applicant's claim, therefore, Applicant's claims are anticipated by Laubach. *In re Schreiber* and *Ex parte Masham, supra*.

For the foregoing reasons, the rejections under the art are respectfully maintained.

8. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37

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CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Vinh T. Luong whose telephone number is 571-272-7109. The examiner can normally be reached on Monday - Thursday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Richard Ridley can be reached on 571-272-6917. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Luong

May 8, 2006



Vinh T. Luong
Primary Examiner

Application/Control Number: 10/720,821

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ATTACHMENT 1

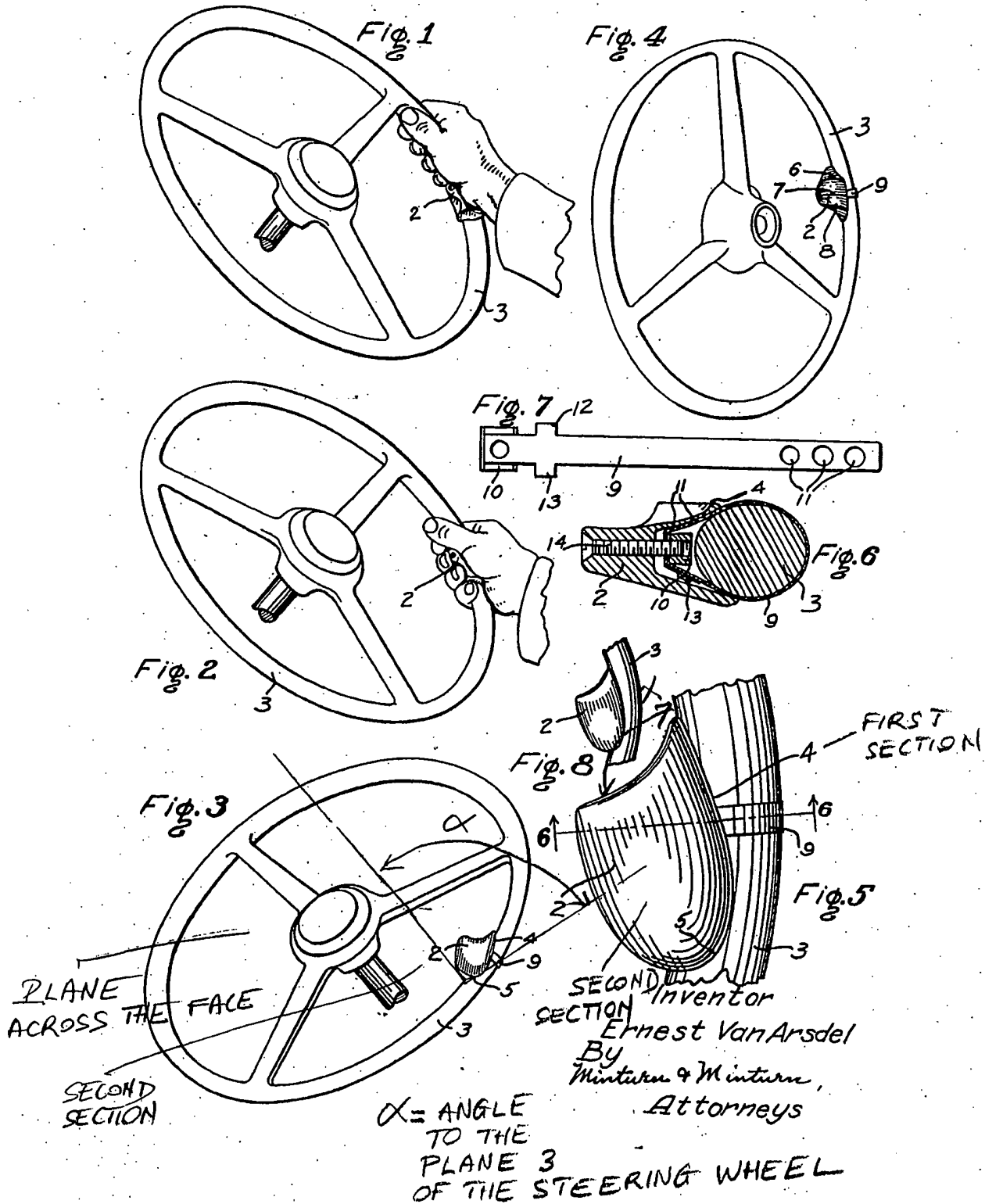
May 24, 1938.

E. VAN ARSDEL

2,118,540

AUTO STEERING WHEEL HANDGRIP

Filed May 10, 1937



Application/Control Number: 10/720,821

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ATTACHMENT 2

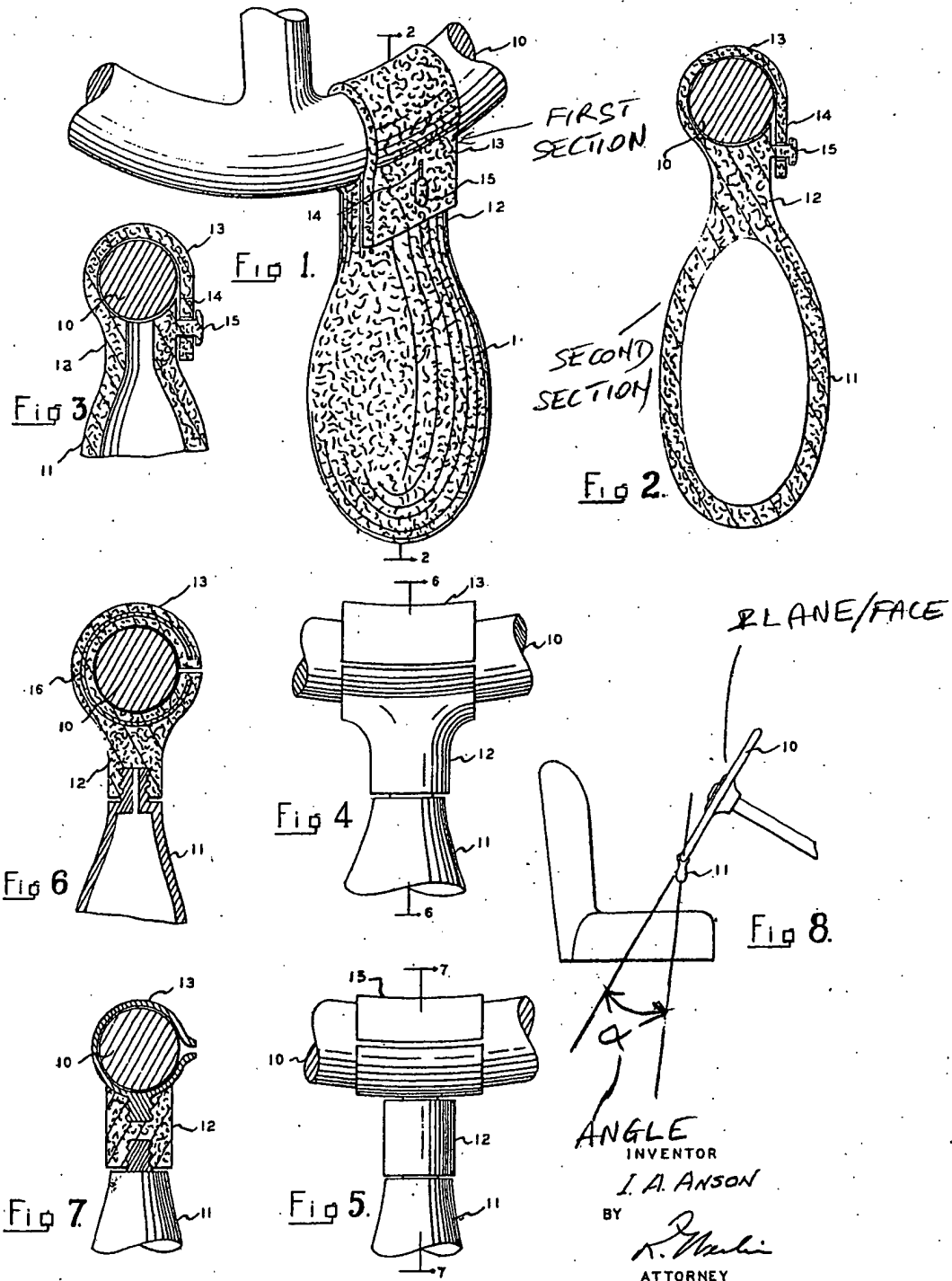
Oct. 25, 1938.

I. A. ANSON

2,134,020

STEERING WHEEL ATTACHMENT

Filed Sept. 30, 1937



Application/Control Number: 10/720,821

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ATTACHMENT 3

March 9, 1926.

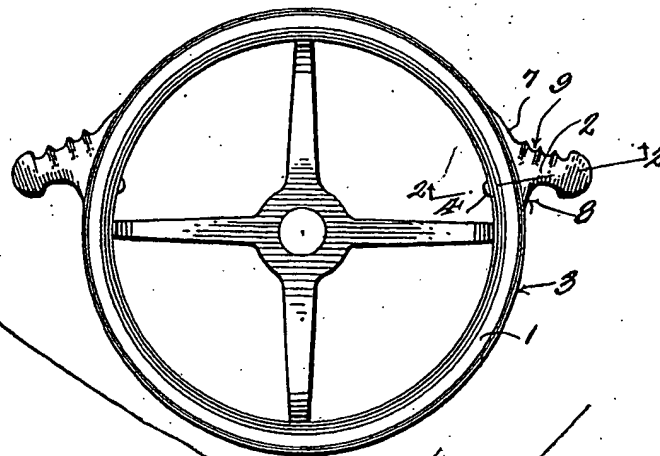
C. E. E. LAUBACH

1,575,848

STEERING WHEEL

Filed July 13, 1925

Fig. 1.



SECOND
SECTION

PLANE/FACE

Fig. 2.

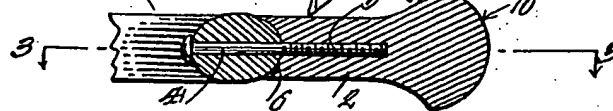
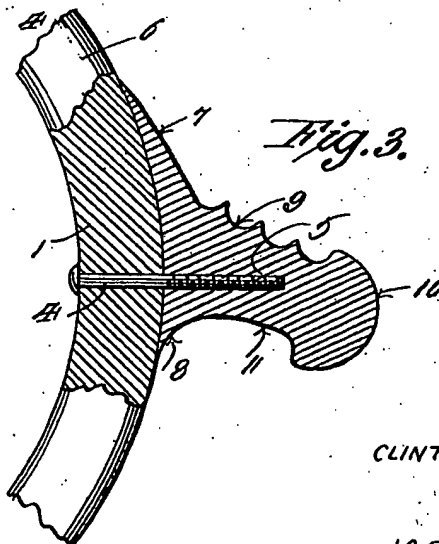


Fig. 3.



WITNESSES

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